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RESULT 1585
AAV83938/c
ID AAV8393
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Query Match
Best Local S
Matches 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            hypertriglyceridemia, mixed (combined) dyslipidemia, lipid or lipoprotein deficient states, and/or any other tissue or plasma disorders of lipid or lipoprotein metabolism. The nucleic acid is useful for diagnosing the presence of or a predisposition for a disorder in a subject which involves detecting a germline alteration in the nucleic acid in the subject. An inhibitor is useful for modulating triglyceride activity by inhibiting expression or activity of (I) or (II). The nucleic acid is useful as a probe or primer. The present sequence is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                     Yeast artificial chromosome; YAC; probe; eukaryotic chromosome; neocentromere; replication; extra-chromosomal element; segregation; cell division; artificial chromosome; gene therapy; human artificial chromosome; transgenic; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 21 BP; 6 A; 5 C; 6 G; 4 T; 0
                                                             New isolated nucleic acid comprising neocentromere sequences from eukaryotic chromosome - used to produce replicable, segregating artificial chromosomes that can carry large amounts of DNA for generations.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             03-MAR-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAV83938
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAV83938 standard;
                                                                                                                                                                                                                                  13-MAY-1997;
26-AUG-1997;
                                                                                                                                                                                                                                                                                   13-MAY-1998;
                                                                                                                                                                                                                                                                                                                   19-NOV-1998.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         PCR primer used
                 Example 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            869 GATTACAGGCGTGAGCCACC 888
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Н
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
                                                                                                                                                                                                  AMRAD
                                                                                                                                                                 g
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GATTACAGGCATGAGTCACC 20
               Page 24; 540pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SEQ ID NO
                                                                                                                                                                 Sart
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                  OPERATIONS PTY LTD
                                                                                                                                                                                                                                  97AU-00006784.
97AU-00008791.
                                                                                                                                                                                                                                                                                   98WO-AU000352
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     of the invention.
                                                                                                                                                               á
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         produce a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.7%;
                                                                                                                                                                   Cancilla MR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             75; 172pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         YAC probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 16.8; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Ç;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length 21;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
                                                               segregating of DNA for gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Gaps
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                                                                                                                                                                                                                      CC produce yeast artificial chromosome (YAC) probes. The YAC probes are used to isolate the nucleic acid sequences of the invention. The specification Cd describes nucleic acid sequences of the invention. The specification CC describes nucleic acid sequences derived from a eukaryotic chromosome, CC including a neocentromere or its functional derivative or hybrid, that CC are able, in a compatible cell, of replicating, acting as extra-CC chromosomal element and segregating during cell division. The sequences CC can be used to construct artificial chromosomes for use in gene therapy CC comprising a replicable, segregating nucleic acid that confers a specific CC phenotype on cells. Human artificial chromosomes can propagate in human CC cells and carry large amounts of DNA (e.g. therapeutic genee), and, being CC extra-chromosomal, they are not mutagenic. The artificial chromosomes are CC also useful for generation of transgenic plants and animals, in CC production of proteins and to make diagnostic reagents, e.g. for CC copy number of a gene in a cell. The constructs may also be used for functional and structural analysis of chromosomes
                                                                                          Matches
                                                                                                                                                                                     Sequence 19 BP; 3 A; 7 C; 4 G; 3 T; 0 U; 2 Other;
                                                                                                                Local
                                          645 CAGGCTGGAGTGCAGTGGC 663
19
                                                                                          16;
                                                                                                                  Similarity
CAGGCTGCAGTGCARTGGY 1
                                                                                          Conservative
                                                                                                                1.7%;
                                                                                          2
                                                                                                                                       Score 16.6;
                                                                                                                  Pred.
                                                                                            Mismatches
                                                                                                                    ŏ.
                                                                                                                  .5e+03
                                                                                                                                          DB 1;
                                                                                                                                       Length 19;
                                                                                               Indels
                                                                                               0
                                                                                            Gaps
                                                                                               0
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RESULT 1586
AAT39828/c
Autonomous replication; episome; transgenic animal; mammal; human; PCR; plasmid; peptide production; polymerase chain reaction; primer; amplify; HSP-MYC; ss.
                                                                                                                                               03-DEC-1996
                                                                                                                                                                                               AAT39828;
                                                                                                                                                                                                                                            AAT39828
                                                                                             Primer B2 for HSP-MYC-A and HSP-MYC-B
                                                                                                                                                                                                                                               standard; DNA; 18
                                                                                                                                               (first entry)
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Synthetic.

JP08173166-A

09-JUL-1996.

26-DEC-1994; 94JP-00321890

26-DEC-1994; 94JP-00321890

WPI; 1996-365585/37 (DAUC) DAIICHI PHARM

COLID

Autonomously replicating DNA sequence - used to produce autonomously replicating plasmid for the production of heterologous proteins.

Example; Page 7; 15pp; Japanese.

AAT39826-T39833 represent amplification primers used to amplify the autonomously replicating DNA sequence (ARS) represented by AAT39825. The primers were used to amplify successively smaller regions of the HeLa HSP70 gene (including the 5' untranslated region) to obtain the ARS. The primer set designated A (AAT39826) amplified the largest HSP70 gene fragment. The next largest fragment was amplified by primer set D (AAT39827) and AAT39828), then set B (AAT39829 and AAT39830), and set C (AAT39831 and AAT39832) amplified the sequence shown in AAT39825. The sequences amplified by these primers all contained the HSP-MYC-A and HSP-MYC-B regions. The amplified ARS sequence is inserted into a plasmid which is then capable of autonomous replication in an episome state in

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                                                                   Query Match
Best Local .
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                                                       Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  host cells. The replication of this plasmid in the host cells is also very stable. The host cells used are cells derived from mammals, preferably from a human. The plasmid is useful to provide a large amount of heterologous peptide in recombinant cells. The offspring of an animal carrying the gene can be used as peptide producing animals
                                                                                                            Sequence 18
                                                                                                                                                  with anti-infective, anti-inflammatory and cytostatic activity. The oligonuclectides are RIP-1 antisense inhibitors and are used in the diagnosis, prevention and treatment of conditions associated with RIP-1 expression include various
                                                                                                                                                                                                        This sequence represents an antisense oligonuclectide which binds to the 3' untranslated region of RIP-1. RIP-1 (also known as RalBP1 and RIIP) is a GTPase activating protein (GAP) thought to be a downstream target of Ral. The invention relates to antisense phosphorothicate oligonuclectides
                                                                                                                                                                                                                                                                                 Example 15;
                                                                                                                                                                                                                                                                                                                                                    WPI; 2000-146889/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                      25-SEP-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-SEP-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            01-FEB-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       US6020198-A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           RIP-1; RalBP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human RIP-1 antisense oligonucleotide ISIS# 23931.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    05-MAY-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAZ89776 standard; DNA; 18 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                           (ISIS-) ISIS PHARM INC.
                                                                                                                                      infections,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Local
                          383
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       665 CAATCTTGGCTCACTGCA 682
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             18
18
                                                      17;
                                                                                                                                                                                                                                                                                                                                                                                CF,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Similarity
                                                                   Similarity
                          CCTCCCAAAGTGCTGGGA 400
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CGATCTTGGCTCACTGCA 1
                                                                                                                                                                                                                                                                                                        inhibition of human RIP-1 expression, useful for diagnosing and treating conditions such as inflammation.
                                                                                                          BP; 4 A; 5 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                      inflammation and tumour formation
                                                                                                                                                                                                                                                                              Col 27; 26pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 5 A; 4 C; 6 G; 3 T; 0 U; 0 Other;
                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                Cowsert LM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            RLIP; antisense inhibitor; anti-inflammatory; cytostatic; e; diagnose; prevent; treatment; tumour formation; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                       98US-00161443
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   98US-00161443.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.7%;
                                                                   94.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 16.4;
Pred. No. 1.
                                                                   Score 16.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DB 1; Length 18; .5e+03;
                                                                   .5e+03
                                                                                DB 1;
                                                                                Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Gaps
                                                      Gaps
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RESULT 1588

PX PX SO SX FX DX AX

14-DEC-1999

US6001652-A.

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RESULT 1589
AAZ39625
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ID AAZ89747 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      This sequence represents an antisense oligonucleotide which binds to the 3 untranslated region of RIP-1 RIP-1 (also known as RalBP1 and RLIP) is a GTPase activating protein (GAP) thought to be a downstream target of Ral. The invention relates to antisense phosphorothicate oligonucleotides with anti-infective, anti-inflammatory and cytostatic activity. The oligonucleotides are RIP-1 antisense inhibitors and are used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 18 BP; 5 A; 4 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          diagnosis, prevention and treatment of conditions associated with RIP-1 expression. Conditions associated with RIP-1 expression include various
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      01-FEB-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            RIP-1; RalBP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       05-MAY-2000
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                    Synthetic
                                                                                     Human; cREL;
                                                                                                                               Human cREL mRNA inhibiting antisense oligo ISIS #24109
                                                                                                                                                                             28-FEB-2000
                                                                                                                                                                                                                         AAZ39625;
                                                                                                                                                                                                                                                                   AAZ39625
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Antisense inhibition of human RIP-1 expression, useful for diagnosing, preventing and treating conditions such as inflammation.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2000-146889/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                25-SEP-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          25-SEP-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        anti-infective;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human RIP-1 antisense oligonucleotide ISIS# 23930
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          infections,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (ISIS-) ISIS PHARM INC.
Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                            1112
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                                                                                                                                                                                                                                                                                                                                                                                                                AGGCTGGTCTCAAACTCC 1129
                                                                                                                                                                                                                                                                   standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                  AGGCTGGTCTCAAACTTC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        inflammation and tumour formation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               27; 26pp;
                                                                                        transcriptional activator; antisense compound; therapeutic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cowsert
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     RLIP; antisense inhibitor; anti-inflammatory; cytostatic; e; diagnose; prevent; treatment; tumour formation; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                98US-00161443
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1.7%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 16.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.5e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 include various
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
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RESULT 1590
AAH40733/c
ID AAH4073
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention provides antisense compounds targeted to a coding region, 3'UTR or 5'UTR of a nucleic acid molecule encoding human CREL (transcriptional activator). The antisense compounds are useful as research agents and diagnostics such as in the elucidation of the function of a particular gene. The antisense compounds can be useful as therapeutic modalities that can be configured to be useful in treatment regimes for treatment of cells, tissues and animals, especially humans. In the prior art, there are no known therapeutic agents which effectively inhibit the synthesis of CREL and additional agents capable of inhibiting CREL function are still required. Sequences AR239588-627 represent
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 1; Col 28; 26pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Antisense
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2000-061889/05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Monia
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                                                                                                                                                                                                                                                         SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial procedular controllesterolaemia; polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (ISIS-) ISIS PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 18-SEP-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         antisense
                                                                                                                                                                                                                                                                                                                      Single nucleotide polymorphism; SNP; single nucleotide primer extension; SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAH40733 standard; DNA; 18
New genotyping oligonucleotide, useful for detecting the presence,
                                                                                                                                           13-OCT-2000; 2000WO-US028436
                                                                                                                                                                      26-APR-2001.
                                                                                                                                                                                                   WO200129262-A2
                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                               SNP specific upper PCR primer SEQ ID 3529.
                                                                                                                                                                                                                                                                                                                                                                                             14-AUG-2001
                            WPI; 2001-290930/30
                                                      Picoult-Newburg L,
                                                                                      (ORCH-) ORCHID BIOSCIENCES INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        385 TCCCAAAGTGCTGGGATT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ₽₽,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           TCCCAAAGTGCTAGGATT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               modulation of human cREL expression
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cowsert LM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 5 A; 4 C; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  98US-00156253
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             98US-00156253
                                                                                                                 99US-0160096P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.7%;
                                                         Poh1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Baker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         oligodeoxynucleotides inhibiting
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        402
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 16.4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    .5e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0;
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Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking complete sites of single nucleotide polymorphisms SNPs. The present invention complete sites for determining the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a complete significance, the SNPE primer is used a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by complete significance are useful for determining the presence, absence or complete significance are useful for determining the presence, absence or complete seases by association analysis the genotyping an individual or group of complete the symptom analysis the genotypic trait suspected of being caused by one or more SNPs. Phenotypic traits include diseases e.g. complete sinsipidus, Lesch-Nyhan syndrome, muscular dystrophy, familial hypercholesterolaemia, polycystic kidney disease, completed of diseases, include symptoms of or susceptibility to multifactorial component is or may be genetic such as autoimmune confidence of which a component is or may be genetic such as autoimmune confidence including, rheumatoid arthritis, multiple sclerosis, muscular includes and in a component is or may be genetic such as autoimmune confidence, nearcer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and confidence in the method is also useful in forensic investigations and investigations and confidence in the method is also useful in forensic investigations and confidence in the method is also useful in forensic investigations and confidence in the method is also useful in forensic investigations and confidence in the method is also useful in forensic investigations and confidence in the such as a confidence in the method is also useful in forensic investigations and confidence in the confidence in the confidence in the confidence in the confidence in 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Claim 1; Page 68; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     acid sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    absence or identity of single polynucleotide polymorphism in a nucleic
Sequence 18 BP; 2 A; 6 C; 6 G; 4 T; 0 U; 0 Other;
                                                                           paternity analysis. for a human SNP cont
                                                                           containing
                                                                                                          The present sequence represents a PCR primer
                                                                               DNA sequence
                                                                                                                         specific
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RESULT 1591 AAH38918/c Matches Query Match Best Local 14-AUG-2001 AAH38918; AAH38918 standard; DNA; 18 874 CAGGCGTGAGCCACCACG 17; 18 CAGGTGTGAGCCACCACG Similarity Conservative (first entry) 94.4%; ВР 891 <u>,,</u> Pred. Mismatches No. 1.5e+03 Indels 0; Gaps

Score 16.4;

DB 1;

Length 18;

0

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Single nucleotide polymorphism; SNP; single nucleotide SNPE; genotyping; agammaglobulinaemia; diabetes insipid polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; s Picoult-Newburg L, 13-OCT-2000; 2000WO-US028436. 26-APR-2001. Homo sapiens. 15-OCT-1999; WO200129262-A2 Lesch-Nyhan (ORCH-) ORCHID BIOSCIENCES INC syndrome; muscular dystrophy; familial hypercholesterolaemia 99US-0160096P. insipidus; primer cancer; extension;

WPI; 2001-290930/30

SNP specific

lower PCR primer SEQ ID 1714.

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     CC includes kits for determining the presence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The CC oligonucleotides are useful for determining the presence, absence or CC identity of a SNP and for genotyping nucleic acid samples by association analysis the genotype of an individual or group of individuals, having a pathological phenotypic trait suspected of being CC caused by one or more SNPs. Phenotypic traits include diseases e.g. CC agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CC dystrophy, familial hypercholesterolaemia, polycystic kidney disease, CC craits also include symptoms of or susceptibility to multifactorial diseases of which a component is or may be genetic such as autoimmune CC disease of which a component is or may be genetic such as autoimmune concreases including, rheumatoid arthritis, multiple sclerosis, multiple sclerosis, multiple sclerosis, such as autoimmune concreases in the method is also useful in forensic investigations and CC paternity analysis. The metend tequence represents a PCR primer specific CC for a human SNP containing NNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SNP
WPI; 2001-290930/30
                                   Picoult-Newburg L,
                                                                                                                                                                                                                                                                                   Homo
                                                                                                                                                                                                                                                                                                                                         polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis;
                                                                                                                                                                                                                                                                                                                                                                                                                         Single nucleotide polymorphism; SNP; single nucleotide primer extension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           14-AUG-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAH39265 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18 BP; 2 A; 5 C; 7 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking primers of single nucleotide polymorphisms SNPs. The present invention sites of single nucleotide polymorphisms SNPs. The present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 1; Page 58; 83pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                           13-OCT-2000; 2000WO-US028436
                                                                                                                                                                                                   26-APR-2001
                                                                                                                                                                                                                                           WO200129262-A2
                                                                                                                                                                                                                                                                                                                                                                                 SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer;
Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 specific upper PCR primer SEQ ID 2061.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1021 GCCTCCCAAGCAGCTGGG 1038
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                                                                                                                                                                                                                                                                                   sapiens.
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                                                                           ORCHID BIOSCIENCES INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                   99US-0160096P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.7%;
94.4%;
                                     Pohl M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 16.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Length 18;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Gaps
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CC primer extension (SNPE) primers, and the sequences of regions flanking CC sites of single nucleotide polymorphisms SNPs. The present invention CC includes kits for determining the presence or absence of a SNP, using the CC oligonucleotides of the invention. The PCR primers are used to amplify a SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The CC oligonucleotides are useful for determining the presence, absence or CC identity of a SNP and for genotyping nucleic acid sample by cassess by association analysis the genotype of an individual or group of individuals, having a pathological phenotypic traits suspected of being CC caused by one or more SNPs. Phenotypic traits include diseases e.g. CC agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CC diseases include symptoms of or susceptibility to multifactorial consteogenesis imperfecta and acute intermittent porphyria. Phenotypic CC inflammation, cancer, nervous system diseases and infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic consternity analysis. The present sequence represents a PCR primer specific for a Number of the present sequence represents a PCR primer specific for a termity analysis. The present sequence represents a PCR primer specific for a succeptibility to the present sequence represents a PCR primer specific for a primer specific contents of the present sequence represents a PCR primer specific for a succeptibility to the present sequence represents a PCR primer specific for a primer specific contents of the present sequence represents a PCR primer specific for a primer specific contents of the present sequence represents a PCR primer specific contents of the present sequence contents of t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic acid sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequences AAH37205
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 1; Page
                                                                       or a human SNP containing DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  60; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          - AAH40944 represent PCR primers, single nucleotide
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Best Loc Matches Query Match Local 375 TGCCTCAGCCTCCCAAAG 392 l Similarity 17; Conserv 18 BP; 5 1.7%; nilarity 94.4%; Conservative 0, Score 16.4; Pred. No. 1. ed. No. 1.5e+03 Mismatches DB 1; Length 18 Indels <u>.</u> Gaps

0

A; 8 C; 3 G; 2 T; 0 U; 0 Other;

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ш

TGCCTCAGCCACCCAAAG

18

RESULT 1593 Human Her-3 mRNA inhibiting antisense oligo ISIS # 19628 30-NOV-2001 AAH47615; AAH47615 standard; DNA; 18 BP (first entry)

Her-3; epidermal growth factor; EGF; receptor/tyrosine kinase; human; antiinflammatory; cytostatic; antibacterial; antisense; ss.

Synthetic. domo sapiens.

US6277640-B1.

21-AUG-2001.

31-JUL-2000; 2000US-00630706

31-JUL-2000; 2000US-00630706

(ISIS-) ISIS PHARM INC

Cowsert LM;

Bennett CF,

WPI; 2001-535134/59

Antisense compounds capable of modulating expression of human Her-3,

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RESULT 1594
ABA82413
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        are commonly used as research reagents and in diagnostics for example, to elucidate the function of particular genes. The antisense compounds are also useful for distinguishing between functions of various members of a biological pathway and for research use. They are also utilized for diagnostics, therapeutics, prophylaxis and in kits. They are useful prophylactically, e.g. to prevent or delay infection, inflammation or tumor formation. Sequences AAH4753-47615 represent chimeric antisense phosphorothicate oligonucleotides having 2'-MCE wings and a deoxy gap, used for the inhibition of Her-3 mRNA expression
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   member
useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention provides antisense compounds capable of inhibiting the expression of human Her-3, a member of epidermal growth factor (EGF) family of receptor/tyrosine kinases. The antisense oligonuclectides are useful for inhibiting the expression of Her-3 in cells or tissues. They
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     formation.
                                                                                                                                                                                                                                                                                                                                                                                                                                         sequence tagged site; STS; osteoporosis; osteopathic; gene therapy; antisense therapy; vaccine; bone disorder; Paget's disease; adapter; sclerostosis; osteomalacia; fibrous dysplasia; PCR primer; linker; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18 BP; 7 A; 3 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                    05-APR-2000; 2000US-00543771
05-APR-2000; 2000US-00544398
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ABA82413 standard;
The present invention describes the human Zmax1 gene and the high mass (HBM) gene, which are found on chromosome 11q13.3. The Zmax1 a genes have osteopathic activities. The genes can be used in gene t antisense therapy and in the production of vaccines. They can be u
                                                                                                          New high bone mass (HBM) and Zmax1 genes and proteins useful modulating bone mass for the treatment of e.g. osteoporosis.
                                                                                                                                                          WPI; 2001-657171/75
                                                                                                                                                                                         Carulli JP,
                                                                                                                                                                                                                                                                                                    21-JUN-2000; 2000WO-US016951
                                                                                                                                                                                                                                                                                                                                                                    WO200177327-A1.
                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human; high bone mass; HBM gene; Zmaxl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Zmax1 gene region physical
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          25-JAN-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ABA82413;
                                                                                Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         388 CAAAGTGCTGGGATTACA 405
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  of epidermal growth for preventing or de
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    \vdash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
                                                                                                                                                                                                                        GENOME THERAPEUTICS CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Col 43-44; 49pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      CAAAGTGCTGAGATTACA
                                                                                Page 36;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                       Little RD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA;
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                                                                             443pp; English.
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delaying
                                                                                                                                                                                         Recker RR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         map preparation STS marker
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
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Pred. No. 1.5e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
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                                                                                                                                                                                           Johnson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             gene; chromosome 11; 11q13.3;
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    h bone
l and HBM
therapy,
used in
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ABA82195/c
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Best Local
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                                                       Query Match
Best Local (
                                       Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                the diagnosis and treatment of bone disorders including osteoporosis, Paget's disease, sclerostosis, osteomalacia and fibrous dysplasia. ABA82038 to ABA82700 and AAG68168 to AAG68193 represent sequences used the exemplification of the present invention
                                                                                                                                                       mass (HBM) gene, which are found on chromosome 11q13.3. The Zmax1 and h genes have osteopathic activities. The genes can be used in gene thera antisense therapy and in the production of vaccines. They can be used the diagnosis and treatment of bone disorders including osteoporosis, paget's disease, sclerostosis, osteomalacia and fibrous dysplasia. hBA82038 to ABA82700 and AAG68168 to AAG68193 represent sequences used the exemnliffcation of the manual can be exemnliffcation of the manual can be exempliffication of the manual can be exempliffication of the manual can be exempliffication of the manual can be used the exempliffication of the manual can be used the exempliffication of the manual can be used the exempliffication of the manual can be used to be exempliffication of the manual can be used to be used the exempliffication of the manual can be used to be used the exemplification of the manual can be used to be used t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; high bone mass; HBM gene; Zmax1 g
sequence tagged site; STS; osteoporosis;
antisense therapy; vaccine; bone disorde
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ABA82195 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  05-APR-2000; 2000US-00543771.
05-APR-2000; 2000US-00544398.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                18-OCT-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   sclerostosis; osteomalacia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Zmax1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     25-JAN-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABA82195
                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                           Disclosure;
                                                                                                                                                                                                                                                                                                                                                            modulating
                                                                                                                                                                                                                                                                                                                                                                                  New high bone mass (HBM)
                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2001-657171/75.
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Carulli JP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (GENO-) GENOME THERAPEUTICS CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         21-JUN-2000; 2000WO-US016951
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO200177327-A1
                                                                                                                                                 exemplification
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                                                                                                              BP;
                                                                                                                                                                                                                                                                                                                       Page 34; 443pp; English
                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Little
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                                                                                                                4 C;
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the
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                                                                                                                7 G;
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                                                                                                                                                   present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Osteoporosis; osteopathic; gene therapy; bone disorder; Paget's disease; adapter; fibrous dysplasia; PCR primer; linker; s
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                                           Mismatches
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                                                                                                                                                                                                                                                                                                                                                                ment of
                                                           16.4;
No. 1.
                                                                                                                0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Johnson ML;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           .5e+03
                                                             .5e+03
                                                                                                                  0 Other;
                                                                                                                                                                                                                                                                                                                                                                                and proteins useful
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                                                                            DB 1;
                                                                                                                                                                                                                                                                                                                                                                e.g. osteoporosis
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              chromosome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length
                                                                            Length
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                                           Indels
                                                                                18;
                                                                                                                                                                           sequences used
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                                                                                                                                                                                                                                                                                                                                                                                        for
                                           Gaps
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                                                                                                                                                                                                                                and HBM
therapy,
used in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       88
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18

CTCTGCCTCCAGGGTTCA

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ABS98053

ID 98053

ID 98053

ABS98053

AC ABS9805

XX Human m

XX Human m

XX Human m

XX Human;

XW Cyclochx

XW Cyclochx

XW GPC-9Loox

XW GPC-9Loox

XW WODP-9Loox

XW WOLDP-9Loox

XW WOLDP-9Loox
This invention relates to the sequence of an isolated nucleic acid CC molecule comprising at least one base variation from that of a known cytochrome P450 A1 (CYP4501A1), cytochrome P450 A2 (CYP4501A1), cytochrome P450 A2 (CYP4501A2), CC cytochrome P450 O2E1 (CYP4501E1), adrenergic receptor beta1 (ADBR1), CC cytochrome P450 O2E1 (CYP4501E1), adrenergic receptor beta1 (ADBR1), CC cytochrome P450 O2E1 (CYP4501E1), adrenergic receptor beta1 (ADBR1), CC cytochrome P450 O2E1 (CYP4501E2), adrenergic receptor beta1 (ADBR1), CC cytochrome P450 O2E1 (CYP4501E2), adrenergic receptor nuclear translocator (C (ANNT), cathepsin S (CTSS), cytochrome P450 A2 (CYP4501A2), CC (CYP4501A2), adrenergic receptor nuclear translocator (CXP2), diazepam binding CC (ANDB1), plutathione-S-transferase (CXP2), histamine-N-methyl CC transferase (NNWT), (Kallikrein 2) KIKZ, nicotinamide -N-methyl CC transferase (NNWT), NADPH quinone oxidoreductase 2 (NQO2), CC (NGC1), UDP-glucuronosyl transferase 2B4 (CYT2B4), UDP-glucuronosyl transferase 2B7 (CYT2B7), UDP-glucuronosyl CC (MT2B4), UDP-glucuronosyl transferase 2B7 (CYT2B7), UDP-glucuronosyl cransferase (UGT2B15), urokinase receptor (UPA), multidrug resistance 1 (MT2), actotransferrin (LTF), multidrug resistance associated protein 3 (CTP4), actotransferrin (LTF), multidrug resistance associated protein 3 (CTP4), or actylcholine muscarinic CC receptor 1, 2, 3, 4, or 5 (CHMR1, CHMR2), CHMR3, CHMR4 or CHMR5) sequence. CC The polymorphisms in the human genes cited in the invention are useful as genetic linkage markers for locating and characterising the genes that CC act responsible for specific traits within the genome and eventually cidentifying the genes responsible for a variety of disorder-related CC craits as a result of their e.g., overexpression, which may be used in diagnosing capturession, mutation or underexpression, which may be used in diagnosing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               aryl hydrocarbon receptor nuclear translocator; ARNT; cathepsin S; CTSS; cyclooxgenase 2; COX2; diazepam binding inhibitor; DBI; haematological; epoxide hydroxylase 2; EPHX2; 5-lipoxygenase activating protein; FLAP; glutathione-S-transferase 12; GST12; histamine-N-methyl transferase; HAMT; kallikrein 2; KLK2; nicotinamide-N-methyl transferase; NNMT; NADPH quinone oxidoreductase 2; NOQ2; sulfotransferase thermolabile; STM; UDP-glucuronosyl transferase 2B7; UDP-glucuronosyl transferase 2B7; urokinase receptor; uPA; multidrug resistance 1; lactotransferrin; orphan nuclear receptor; multidrug resistance associated protein 3; cancer; prostate; acetylcholine muscarinic receptor; CHMR1; CHMR2; CHMR3; CHMR4; CHMR5; altered drug metabolism; cardiovascular function; colorectal tumour; central nexture systems.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 22; Page 141; 714pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Isolated nucleic acid molecules having polymorphisms in known human genes e.g. cytochrome p450 and cathepsin S useful as genetic linkage markers for locating, identifying and characterizing the genes responsible for disorder-related traits.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   28-NOV-2000; 2000US-00724389
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2002-698522/75
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (DNAS-)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DNA SCI LAB
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     resistance gene PCR primer
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CYP4501A2; cytochrome P450 02E; CYP45002E1; LTF;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              #17.
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polymorphic sequences contained in CYP4501A1, CYP4501A2, CYP4502B1, ARNT, EPHX2, GST12, NMMT, NQO2, NRII2, STM, UGT2B4, UGT2B7, UGT2B15, AHR, MDR1 and/or MDR3 are useful for screening individuals for altered drug metabolism. The polymorphic sequences contained in CYP4501A1, CYP94501A2, AHR, MDR1 and/or MDR3 may also be used to screen individuals for susceptibility to cancer. Polymorphic sequences in ADRB1 or CHMR2 are used to screen for altered cardiovascular function, in COX2 for altered susceptibility to colorectal tumours, in DB1 or CHMR1 for altered central nervous system function, in FLAP and HNWT for altered pulmonary, immunological or haematological function, in KLK2 for altered serine protease activity in the prostate, in LTF for altered immunological or haematological function, in CHMR3, CHMR4 or CHMR5 for altered central peripheral nervous system function. The present sequence represents a PCR primer used to amplify the sequences of the invention
Sequence 18 BP; 4 A; 2 C; 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 and/or treating the disorders.
G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    The nucleic acid molecules comprising the
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밁 Ś Best Loca Matches Query Match Local 867 GGGATTACAGGCGTGAGC 884 l Similarity 17; Conserv Conservative 94.4%; 1.7%; 18 0, Score 16.4; Pred. No. Mismatches 1.5e+03 Length 18; Indels 0

0

RESULT 1597
ABK22992/C
ID ABK2299
XX ABK2299
XX ABK2299
XX O9-APRXX Human;
XW Human;
XW Lipid-a
XX Human;
XW Osteopa
XX Homo sa
XX Homo sa
XX Homo sa
XX (GENO-)
PF 25-MAYXX (GENO-)
PA (UYCR-)
PA (UYCR-)
PA (GENO-)
PA (UYCR-)
XX /
PI Carulli
XX /
PI Identif
PI cidentif
PI corresp
XX /
The inv
CC The inv
CC The inv
CC The inv
CC Gene, Z 09-APR-2002 992/c ABK22992 standard; DNA; 18 Human Zmax1 cDNA reverse PCR primer #77. (first entry)

Human; mouse; Zmax1; HBM; high bone mass gene; lipid regulation; stroke; lipid-associated condition; arteriosclerosis; cardiovascular disease; ss; osteoporosis; atherosclerosis; diabetic atherosclerosis; plaque build-up; neurovascular condition; wound healing; gene therapy; PCR primer; probe; bone development discorder; antiarteriosclerotic; cardiovascular; cerebroprotective

Homo sapiens.

WO200192891-A2

06-DEC-2001.

25-MAY-2001; 2001WO-US016946

26-MAY-2000; 2000US-00578900

UNIV CREIGHTON SCHOOL MEDICINE GENOME THERAPEUTICS CORP.

(UYCR-)

Carulli JP, Little RD, Recker RR, Johnson

WPI; 2002-097784/13.

diagnosing, treating or preventing e.g., a identifying a molecule that binds to high corresponding wild type gene. Identifying molecules involved in lipid regulation, useful for arteriosclerosis, bone mass gene ဝူ comprises

Disclosure; Page 39; 409pp; English.

The invention relates to a method for identifying a molecule involved in lipid regulation comprising identifying a molecule that binds to or inhibits binding of a molecule to high bone mass (HBM) or its wild type gene, Zmax1. Compounds identified by the method are useful for treating, diagnosing, preventing or screening for normal and abnormal lipid-

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RESULT 1598
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       associated conditions, including arteriosclerosis, cardiovascular disease, stroke, and osteoporosis. The compounds may also be used in the treatment or prevention of diabetic atherosclerosis, neurovascular conditions caused by plaque build-up, poor circulation due to plaque build-up and associated poor wound healing. The methods may be used in gene therapy, pharmaceutical development, and diagnostic assays for bone development disorders. Molecules identified by comparison of Zmax1 and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human; mouse; Zmax1; HBM; high bone mass gene; lipid regulation; stroke; lipid-associated condition; arteriosclerosis; cardiovascular disease; 88; osteoporosis; atherosclerosis; diabetic atherosclerosis; plaque build-up; neurovascular condition; wound healing; gene therapy; PCR primer; probe; bone development disorder; antiarteriosclerotic; cardiovascular;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             HBM systems can be used as surrogate markers in pharmaceutical development, in diagnosis of human or animal bone disease, and in the treatment of bone diseases. Sequences ABK22776-ABK23411 represent cDNA molecules encoding human Zmax1 and HBM, and PCR primers, probes, linkers
The invention relates to a method for identifying a molecule involved in lipid regulation comprising identifying a molecule that binds to or inhibits binding of a molecule to high bone mass (HBM) or its wild type gene, Zmax1. Compounds identified by the method are useful for treating, diagnosing, preventing or screening for normal and abnormal lipid-associated conditions, including arteriosclerosis, cardiovascular disease, stroke, and osteoporosis. The compounds may also be used in the treatment or prevention of diabetic atherosclerosis, neurovascular
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human Zmax1 cDNA reverse PCR primer #186.
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                                                                                                                                                                                                             Identifying molecules involved in lipid regulation, useful diagnosing, treating or preventing e.g., arteriosclerosis, identifying a molecule that binds to high bone mass gene of corresponding wild type gene.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    06-DEC-2001.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      osteopathic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   09-APR-2002
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                                                                                                                                                                            Disclosure; Page 41; 409pp; English.
                                                                                                                                                                                                                                                                                                                 WPI; 2002-097784/13.
                                                                                                                                                                                                                                                                                                                                                         Carulli JP, Little RD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                     26-MAY-2000; 2000US-00578900
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                sapiens.
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                                                                                                                                                                                                                                                                                                                                                                                              SCHOOL
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Pred. No. 1.5e+03;
                                                                                                                                                                                                                                                                                                                                                                                                MEDICINE
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                                                                                                                                                                                                                                       gene or its
                                                                                                                                                                                                                                                                              useful
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         conditions caused by plaque build-up, poor circulation due to plaque build-up and associated poor wound healing. The methods may be used in gene therapy, pharmaceutical development, and diagnostic assays for bone development disorders. Molecules identified by comparison of Zmax1 and HBM systems can be used as surrogate markers in pharmaceutical development, in diagnosis of human or animal bone disease, and in the treatment of bone diseases. Sequences ABK22776-ABK23411 represent cDNA molecules encoding human Zmax1 and HBM, and PCR primers, probes, linkers
                        The present invention describes human NEDL-1 is located to chromosome 7, more specifically to 7p. The present invention also describes a nucleic acid probe comprising: (a) a nucleic acid with a lof the base sequence of the 6200 base pair sequence given in ACC49481 (I), or its complementary base sequence; or (b) a nucleic acid hybridisable with the nucleic acid with a base sequence of (I) or its complementary base sequence under stringent conditions. The NEDL-1 ger and its encoded protein can be used in the diagnosis and prognosis of neuroblastoma. The present sequence represents a PCR primer for GAPDH, which is used in an example from the present invention
                                                                                                                                                                                                      Novel gene NED-1 as probes of neuroblastoms
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                                                                                                                               WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; NEDL-1; neuroblastoma; GAPDH; PCR primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human GAPDH
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ACC49483 standard; DNA; 18
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                                                                                                                                                                           Example 5; Page 34; 86pp; Japanese.
                                                                                                                                                                                                                                                                       Nakagawara A,
                                                                                                                                                                                                                                                                                                    (HISM )
                                                                                                                                                                                                                                                                                                                                            24-AUG-2001; 2001JP-00254974.
18-APR-2002; 2002JP-00116753.
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17; Conserv
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CHIBA PREFECTURE.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first
                                                                                                                                                                                                                                                                         Miyazaki
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Query Match Best Local S Matches 17

1.7%;
al Similarity 94.4%;
17; Conservative

0,

Mismatches

Score 16.4; DB 1; Pred. No. 1.5e+03;

DB 1;

Length

18;

Indels

0,

Gaps

0

Sequence

18

BP; 5

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3 C; 6 G; 4 T; 0 U;

0 Other;

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RESULT 1600
ACC45793
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                             The invention relates to novel transgenic animals expressing the high CC bone mass (HBM) gene, expressing the corresponding wild type HBM gene, comprising an alteration of the gene encoding LRP5 or LRP6, or expressing CC an LRP5 that is modulated by an altered gene control sequence introduced by homologous or non-homologous recombination. The transgenic animals are CC for the study of bone density modulation or bone mass modulation. The conclude invention has osteopathic and cycostatic activity. The polymucleotides of CC the invention may have a use in gene therapy. The transgenic animals and CC nucleic acids are for the study of bone density modulation, where the CC strength, trabecular number, bone size, or bone tissue connectivity. The cransgenic animals, nucleic acids and methods are useful for identifying CC molecules involved in bone development, and for developing pharmaceutical CC mospositions, which may be employed for treating or preventing bone CC diseases, e.g. osteoporosis, osteomalacia, rickets, Paget's disease, or neoplasms of the bone. The transgenic animals and nucleic acids are also useful in methods for diagnosing diseases involved in bone development, and for most are also cuseful in methods for diagnosing diseases involved in bone development, or characterised by reduced bone density or mass. The present sequence is cused in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New transgenic animals (e.g. mice), useful as models for studying bone density modulation, developing drugs for treating or preventing bone diseases (e.g. osteoporosis), or diagnosing diseases characterized by
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17-MAY-2001; 2001US-0291311P.
01-FEB-2002; 2002US-0353058P.
04-MAR-2002; 2002US-0361293P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   gene therapy; bone density modulation; bone strength; trabecular number; bone size; bone tissue connectivity; bone disease; osteoporosis; PCR; osteomalacia; rickets; Paget's disease; neoplasm of the bone; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; high bone mass; HBM; LRP5; LRP6; transgenic; bone mass modulation; gene therapy; bone density modulation; bone strength; trabecular number; bone size; bone tissue connectivity; bone disease; osteoporosis; PCR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human HBM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Bex FJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Page 57; 603pp; English
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Best Local Similarity

1.7%;

Score 16.4; DB 1; Pred. No. 1.5e+03;

Length 18

Query Match

1.7%;

Score

16.4;

DB 1;

Length

Query Match Sequence 18

BP; 4 A; 3 C; 7 G; 4 T; 0 U; 0 Other;

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RESULT 1601
RCC45575/c
ID ACC4557
XX ACC4557
XX ACC4557
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XX BOONE SI
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XX Human;
XX Homo so
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PR 01-PEB-
PR 04-MAR-
XX ACGENO-
PA (GENO-)
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                                                                                 The invention relates to novel transgenic animals expressing the high CC bone mass (HBM) gene, expressing the corresponding wild type HBM gene, comprising an alteration of the gene encoding LRP5 or LRP6, or expressing CC an LRP5 that is modulated by an altered gene control sequence introduced by homologous or non-homologous recombination. The transgenic animals are CC for the study of bone density modulation or bone mass modulation. The comparation and cytostatic activity. The polyunclectides of the invention may have a use in gene therapy. The transgenic animals and nucleic acids are for the study of bone density modulation, where the bone mass is modulated relative to non-transgenic animals of the same competes in more than one parameter selected from bone density, bone strength, trabecular number, bone size, or bone tissue connectivity. The cransgenic animals, nucleic acids and methods are useful for identifying molecules involved in bone development, and for developing pharmaceutical compositions, which may be employed for treating or preventing bone consection methods for diagnosing diseases involved in bone development, or constants and nucleic acids are also useful in methods for diagnosing diseases involved in bone development, in the expension of the invention of the i
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17-MAY-2001;
01-FEB-2002;
04-MAR-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New transgenic animals (e.g. mice), useful as models for studying bone density modulation, developing drugs for treating or preventing bone diseases (e.g. osteoporosis), or diagnosing diseases characterized by reduced bone density.
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   Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Babij P,
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                                                                 used in the exemplification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Disclosure; Page 55; 603pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2003-129278/12.
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      18
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; 2001US-0291311P.
; 2002US-0353058P.
; 2002US-0361293P.
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   4 C; 7
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         0 Other;
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RESULT 1603
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Matches 17
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                                                                                                                                                                                                                                      The present invention describes the human BMCC1 protein. The BMCC1 gene has high homology with a part of BNIP2, and is located to the chromosome 9. BMCC1 has cytostatic activity. The BMCC1 protein and its encoded gene are applicable in studying biology, pathology and the onset of cancer. BMCC1 can also be used in the diagnosis, prognosis and screening of drugs for tumour e.g. neuroblastoma, including the provision of gene data and protein function on human neuroblastoma. The present sequence represents a PCR primer for human GAPDH, which is used in an example from the
                                                                                                                                                                                                                                                                                                                                                                                      Novel human BMCCI protein and encoded gene having high homology with a part of BNIP2, applicable in studying biology, pathology and onset of cancer, as well as diagnosis, prognosis and screening of drugs for tumor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (HISM )
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human GAPDH
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                                                                                                                                                                                                     Sequence 18 BP; 5
                                                                                                                                                                                                                                                                                                                                                  Example 9;
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 21-AUG-2003
                                               ACA62881
                                                                                                                                                       Local Similarity hes 17; Conserv
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                                                                                                                                316 GTAGAAACAGGGTTTCAC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              PCR primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BMCC1; chromosome 9; cytostatic; cancer; tumour; neuroblastoma;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      HISAMITSU PHARM CO LTD CHIBA PREFECTURE.
                                                                                                                                                                                                                              invention
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                                                 standard;
                                                                                                           GTAGAGACAGGGTTTCAC
                                                                                                                                                                                                                                                                                                                                                    Page 27; 99pp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  PCR primer SEQ ID NO:49.
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  (first entry)
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                                                  DNA; 18
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                                                                                                                                                                  1.7%;
                                                                                                                                                                                                     3 C; 6 G; 4 T; 0 U; 0 Other;
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                                                                                                                                                                  Score 16.4; DB 1;
Pred. No. 1.5e+03;
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                                                                                                                                                                             Length 18;
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Osteopathic; Gene therapy; High Bone Mass; HBM; LRP5; Zmax1; LRP6; bone mass modulation; osteoporosis; STS; sequence tagged site; ds. Sequence tagged site #372 used to prepare Zmax1 (LRPS) gene region map.

osteoporosis;

sequence

bone

mass

modulation;

04-DEC-2003 ADB98491;

(first entry)

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ADB98491
ID ADB
XX ADB
AC ADB
XX ADB
XX O4-
XX Seq
XX Seq
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XX Ost
XX Sx bon
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CC desired nucleic acid (NA) that contains multiple repeats of a CC desired nucleic acid (NA) that contains multiple repeats of a CC providing a treated sample that may contain the desired NA in which CC providing a treated sample that may contain the desired NA in which CC several predetermined repeating NA target sequences are hybridised with a CC NA probe, analysing for presence of hybridised NA containing the MA. The method is useful for determining the presence of the desired NA. The method CC is useful for determining the presence or absence of desired nucleic cacids that contain multiple repeats of a predetermined NA target CC sequence, in a NA sample obtained from a biological sample, where the CC distinguishing human and bacterial NA. The method is analyse detection and quantification of the presence of a NA without the need to undergo a NA target sequence enrichment step prior to a NA CC hybrid detection step. The method enables rapid and accurate detection of a desired NA that contains multiple repeats of a NA target sequence. This sequence represents a probe used to detect the human Alu repeat sequence. This
                                                                                                                                                                                                                                                                                                       RESULT 1604
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Determining presence or absence of desired nucleic acids that contain multiple repeats of predetermined nucleic acid target sequences in a sample, by using nucleic acid hybridization methods.
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25-AUG-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 1; Page 27; 31pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                     ADB98491 standard; DNA;
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17; Conserv
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SHULTZ J W.
                                                                                                                                                                                                                                                                                                                                                                                                                                 AGTAGCTGGGACTACAGG 746
                                                                                                                                                                                                                                                                                                                                                                                    AGTAGCTGGGATTACAGG 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            99US-00358972.
99US-00383316.
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برد د.

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XX Oste
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention relates to High Bone Mass (HBM), LRP5 (Zmax1) ar LRP6 mutants, which results in a HBM-like phenotype when expressed in cell. The HBM-like phenotype results in bone mass modulation and/or lilevel modulation. The invention is useful for diagnosing a HBM-like phenotype in a subject and for preparing a composition for modulating bone mass and/or lipid levels in a subject suffering from e.g. osteoporosis. The present sequence is a Sequence Tagged Site (STS) marker, which was used to prepare a physical map of the Zmax1 (LRP5) creation.
11-MAY-2001; 2001US-0290071P.
17-MAY-2001; 2001US-0291311P.
01-FEB-2002; 2002US-0353058P.
04-MAR-2002; 2002US-0361293P.
                                                                                                                                                                                                                                                          Homo
                                                                                                                                                                                                                                                                                                 Osteopathic; Gene the bone mass modulation;
                                                                                                                                                                                                                                                                                                                                                                      Sequence tagged site #154 used
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New nucleic acid comprising a mutation in LRP5 or LRP6, useful for diagnosing a HBM-like phenotype in a subject and for preparing a composition for modulating bone mass and/or lipid levels in a subject
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17-MAY-2001; 2001US-0291311P.
01-FEB-2002; 2002US-0353058P.
04-MAR-2002; 2002US-0361293P.
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                                                                                                                                                                                                                                                                                                                                                                                                                   entry)
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Pred. No. 1.
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STS; sequence tags
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ion and/or lipid
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                                                                                                                                                                                                                                                                                                                                                                    region
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RESULT 1606
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Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The present invention relates to High Bone Mass (HBM), LRP5 (Zmax1) and LRP6 (mutants, which results in a HBM-like phenotype when expressed in a cell. The HBM-like phenotype results in bone mass modulation and/or lipid level modulation. The invention is useful for diagnosing a HBM-like phenotype in a subject and for preparing a composition for modulating bone mass and/or lipid levels in a subject suffering from e.g. osteoporosis. The present sequence is a Sequence Tagged Site (STS) marker, which was used to prepare a physical map of the Zmax1 (LRP5) gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               diagnosing a HBM-like phenotype in a composition for modulating bone mass suffering from e.g. osteoporosis.
                                        Non-nucleotide probe probes to undesired s homologous to randoml
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence
                                                                                     WPI; 2003-421160/39.
                                                                                                            Kirtsen
                                                                                                                                                                 24-SEP-2001; 2001US-0324499P.
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                                                                                                                                                                                                                                  WO2003027328-A2
                                                                                                                                                                                                                                                        Synthetic
                                                                                                                                                                                                                                                                              probe.
                                                                                                                                                                                                                                                                                         non-nucleotide
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New nucleic acid comprising
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                                                                                                                                                                                      24-SEP-2002;
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                                                                                                                                                                                                                                                                                                                                                         ADH59603;
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                                                                                                                                BOSTON PROBES INC.
DAKOCYTOMATION DENMARK AS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            18 BP; 5
                                                                                                                                                                                                                                                                                                                                                                               standard; DNA;
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                                                                                                          Hyldig-Nielsen
                                                                                                                                                                                       2002WO-US030573
                                                                                                                                                                                                                                                                                                                                   (first
                                        e probe for suppressing binding of detectable nucleic acid esired sequences, has aggregate nucleobase sequence randomly distributed repeat sequence of genomic nucleic
                                                                                                                                                                                                                                                                                       probe;
                                                                                                                                                                                                                                                                                                             probe
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                                                                                                                                                                                                                                                                                         Bacterial Artificial
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                                                                                                                                                                                                                                                                                                                                                                                                                                                          702
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           a mutation in LRP5 or LRP6, useful
type in a subject and for preparing
bone mass and/or lipid levels in a s
                                                                                                                                                                                                                                                                                                              invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Pred.
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                                                                                                            Williams
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                                                                                                                                                                                                                                                                                         BAC;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    cell, and the sample is metaphase spreads, interphase nucleic cell, and the sample is metaphase spreads, interphase nucleic or nucleic found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid reference array. The method comprises treating a sample of genomic nucleic acid and control genomic nucleic acid and control genomic nucleic acid and control genomic nucleic acid and the array with the mixture of the probe under suitable hybridization conditions, contacting the array with treated mixture of sample and control genomic nucleic acid and the array with treated mixture of sample and comparing the intensities of the signals from the differential labels of the array to that caused by hybridization of the probes to genomic nucleic acid, thus determining one or more variations in copy numbers of sequences in the carray is determined using an intercalating dye or a detectable antibody, or its fragment, that is specific for a nucleic acid/nucleic acid hybrid. The sample of genomic nucleic acid to be tested and the reference of nucleic acid are labelled with detectable moiety such that hybridization of the genomic array is determined by determining the presence, amount or location of the detectable moiety such that hybridization of the genomic array is determined by determining the presence, absence, amount or location of the detectable moiety such that hybridization carrays. The genomic array comprises nucleic acid that is prepared from Bacterial Arctificial Chromosome (BAC) clones. The presence absence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the one or more detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the hybridization of the one or more detectable nucleic acid probes to the target genomic nucleic acid of the sample. The genomic nucleic acid is contained in a fixed tissue or a coll the sample.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                                                                                                                                                                                                                                             WO2003027328-A2
                                                                                                                                                                                                                                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  non-nucleotide probe; Bacterial Artificial Chromosome clone; BAC;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Non-nucleotide probe of the invention #19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-MAR-2004 (first entry)
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                                                                                                                                       24-SEP-2001; 2001US-0324499P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           l Similarity
17; Conserv
                                 BOSTON PROBES INC.
DAKOCYTOMATION DENMARK
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              a non-nucleotide probe
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 94.4%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              the binding of one or more detectable
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              G; 4 T;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 16.4;
Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5e+03
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for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the one or more detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the hybridization of the one more detectable nucleic acid probes to the target genomic nucleic acid probes to the target genomic nucleic acid the sample. The genomic nucleic acid is contained in a fixed tissue or the sample. The genomic nucleic acid is contained in a fixed tissue or the sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Non-nucleotide probe for suppressing binding of detectable nucleic acid probes to undesired sequences, has aggregate nucleobase sequence homologous to randomly distributed repeat sequence of genomic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Kirtsen NV, Hyldig-Nielsen JJ, Williams \P^1
                                                                                                                                                                                                                                                                                                                                                                                                                                                     cell, and the sample is metaphase spreads, interphase nucleic or nuclein found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The present sequence represents a non-nucleotide probe. The probe is useful for suppressing the binding of one or more detectable nucleic acprobes, that are greater than 100 base pairs and that have been derived from genomic nucleic acid, to one or more undesired sequences in an assumption.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 10;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SEQ ID NO 21; 103pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    or nucleic
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ADH7 Matches Query Match Best Local : The method comprises treating a sample of genomic nucleic acid and control genomic nucleic acid, which are differentially labelled, the array or both the sample and control genomic nucleic acid and the array with the mixture of the probe under suitable hybridization conditions, contacting the array with treated mixture of sample and control genomic nucleic acid under suitable hybridization conditions, and comparing the intensities of the signals from the differential labels of the array to that caused by hybridization of the probes to genomic nucleic acid, thus determining one or more variations in copy numbers of sequences in the sample as compared with the relative copy numbers of substantially identical sequences in the control. The hybridization of the genomic array is determined using an intercalating dye or a detectable antibody, or its fragment, that is specific for a nucleic acid/nucleic acid hybrid. The sample of genomic nucleic acid to be tested and the reference of nucleic acid are labelled with detectable moiety such that hybridization of the genomic array is determined by determining the presence, absence, amount or location of the detectable label on the one or more genomic arrays. The genomic array comprises nucleic acid that is prepared from Bacterial Artificial Chromosome (BAC) clones. The present sequence represents a non-nucleotide probe of the invention. human; T-cell associated disease; Vbeta; autoimmune disease; degenerative nervous system disease; graft versus host disease; degenerativity disease; infectious disease; neoplastic dis Addison's disease; atrophic gastrilis; degenerative nervous system disease; multiple sclerosis; Sequence 18 BP; 4 A; 7 C; 3 G; 4 T; 0 U; 0 Other; that of a control sample using a genomic nucleic acid reference array. Human Vbeta microsatellite primer #25. ADH71082; ADH71082 standard; DNA; 18 25-MAR-2004 731 TAGCTGGGACTACAGGCG 748 17; 18 Similarity TAGCTGGGATTACAGGCG 1 Conservative (first entry) 94.4%; 0 Score 16.4; Pred. Mismatches No. 1.5e+03; DB 1; Length 18; Indels 0 Gaps 0

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neoplastic disease;

disease;

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RESULT 1609
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AC ADH7675
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AC ADH7675
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                  atrophic gastritis. Degenerative nervous system diseases include multiple celerosis and Alzheimer's disease. Hypersensitivity diseases include Type I hypersensitivity diseases include Type I hypersensitivity diseases include Type allergies, Type II hypersensitivities such as those present in Goodpasture's syndrome and Type IV hypersensitivities such as those manifested in leprosy. Infectious diseases include viral infections caused by viruses such as HIV, fungal infections such as those caused by the yeast genus Candida, parasitic infections such as those caused by schistosomes, filaria and bacterial infections such as those caused by Mycobacterium. Neoplastic diseases include lymphoproliferative diseases such as leukaemias, lymphomas and cancers such as cancer of the brain, breast. The present sequence represents a Vbeta microsatellite primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to a kit for diagnosing and treating T-cell associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, VbetaRNA or cDNA. The kit is useful for diagnosing organ transplant rejection and diagnosing and treating T-cell associated diseases including autoimmune diseases, degenerative nervous system diseases, graft versus host disease, hypersensitivity diseases, infectious disease, and neoplastic diseases. Autoimmune diseases include Addison's disease, and neoplastic diseases. Autoimmune diseases include Addison's disease,
                      22-APR-2004
                                                                                                                                                                                                                                                                                                                                                    Sequence 18 BP; 3 A; 6 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Kit for diagnozing and treating T-cell associated diseases e.g. autoimmune, degenerative nervous system and infectious disease, compuncteic acid primers specifically priming and allowing amplification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Hood LE,
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                                                          ADH76753;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Disclosure; SEQ ID NO 1276; 164pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2004-059052/06.
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                                                                                               ADH76753 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Vbeta gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  19-SEP-1994;
19-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Alzheimer's disease; hypersensitivity disease; type I hypersensitivity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ROWE/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ноод/) ноод ц в.
                                                                                                                                                                                                                                    641 CACCCAGGCTGGAGTGCA 658
                                                                                                                                                                                                18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               cancer; 88; primer; microsatellite.
                                                                                                                                                                                                                                                                                             Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ROWEN L.
                                                                                                                                                                                              CATCCAGGCTGGAGTGCA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Rowen L;
                                                                                                                                                                                                                                                                           Conservative
                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  94US-00309335.
95US-00531241.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           99US-00263959.
                                                                                               DNA;
                                                                                                                                                                                                                                                                                             94.4%;
                                                                                               18
                                                                                               ВÞ
                                                                                                                                                                                                                                                                         0;
                                                                                                                                                                                                                                                                                             Score 16.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                           Mismatches
                                                                                                                                                                                                                                                                                           No.
                                                                                                                                                                                                                                                                                             1.5e+03
                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                                                                                                                                                             Length 18;
                                                                                                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 infectious diseases
                                                                                                                                                                                                                                                                       ٥,
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ation of a
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sequence comprising one or more of the nucleotide exchanges (SNP's) given in the specification and at least 8 bases of surrounding sequence of the MCHR1 gene. The composition has anorectic activity. The polynucleotide composition may be used in gene therapy to treat the disorders of the invention. The composition is useful for diagnosing obesity related to the presence of a molecular variant of the MCHR1 gene or a susceptibility to the disorder. The MCHR1 protein or polynucleotide is useful for preparing a medicament for treating or preventing obesity related to presence of a molecular variant of the MCHR1 gene. This polynucleotide represents an MCHR1 primer of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New diagnostic composition, useful presence of a molecular variant of the disorder.
Sequence 18 BP; 5 A; 2 C; 7 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The invention relates to a novel diagnostic polynucleotide composition. The polynucleotide composition comprises: a sequence encoding a polypeptide with defined sequences given in the specification; a sequence capable of hybridizing to a melanin-concentrating hormone receptor 1 (MCHR1) gene; a polynucleotide encoding an MCHR1 polypeptide; or a melanin-concentration provided the concentration of the concen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Platzer M,
Reichwald K;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          melanin-concentrating hormone receptor 1; MCHR1; anorectic; gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 2; Page 43; 76pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2004-062377/06
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              05-JUN-2003; 2003WO-EP005917
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO2003104489-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               obesity; primer; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              MCHR1 genomic sequence analysis primer #62.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (UYPH-) UNIV PHILIPPS MARBURG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Platzer C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gudermann T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     for diagnosing the MCHR1 gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Hebebrand J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     or a susceptibility to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              a sequence
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Matches Query Match Local 729 AGTAGCTGGGACTACAGG 746 _ 17; Conserv Conservative 94.4%; 1.7%; 0; 18 Pred. No. Score 16.4; DB 1; Mismatches 1.5e+03 Length 18; Indels ٥, Gaps 0

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RESULT 1610
ADPO8780
ID ADPO878
XX ADPO878
AC ADPO878
XX 5
DT 26-AUG-
XX 5
DT 26-AUG-
XX 5
DT 26-AUG-
XX 6
DE Extend
XX CP6; GP
KW Single
XX Single
                                                                                                                   breast cancer; cytostatic; gene therapy; human; platelet glycoprotein VI; GP6; GPIV; GPVI; chromosome 19q13.4; ss; PCR; primer; SNP;
                                                                                                                                                                                 Extend primer 117 used to genotype human glycoprotein VI polymorphism
                                                                                                                                                                                                                             26-AUG-2004
                                                                                                                                                                                                                                                                      ADP08780;
                                                                                                                                                                                                                                                                                                            ADP08780
                                                                                                    nucleotide
                                                                                                                                                                                                                                                                                                            standard; DNA;
                                                                                                                                                                                                                           (first entry
                                                                                                    polymorphism
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WO2004047767-A2

Homo sapiens

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RESULT 1611
ADP46226/c
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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human glycoprotein VI (platelet) (GP6; GPIV;GPVI) DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           10-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               25-NOV-2002; 2002US-0429136P
24-JUL-2003; 2003US-0490234P
                                                                                                                                                                                                               single nucleotide polymorphism;
Rho family guanine-nucleotide exchange factor; KIAA0861;
chromosome 3q27.3; probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 18 BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   25-NOV-2003; 2003WO-US037966
                                                                                                                                                                                                                                                        breast
                                                                                                                                                                                                                                                                                Extend
                                                                                                                                                                                                                                                                                                         26-AUG-2004
                                                                                                                                                                                                                                                                                                                                 ADP46226;
                                                                                                                                                                                                                                                                                                                                                        ADP46226
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Example 3;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (SEQU-)
                                                                                                                                             10-JUN-2004.
                                                                                                                                                                     WO2004047623-A2
                                                                                  25-NOV-2002;
24-JUL-2003;
                                                                                                                     25-NOV-2003; 2003WO-US037948
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               RB,
                                   RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                            876
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        2004-441082/41.
                                                                                                                                                                                                                                                                               primer 7 used to genotype human KIAA0861 polymorphism
                                                                                                                                                                                                                                                                                                                                                                                                                     \vdash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  l Similarity
                                                                                                                                                                                                                                                        cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       SEQUENOM
                                                          SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                         standard;
                                                                                                                                                                                                                                                                                                                                                                                                                     GGTGTGAGCCACCACGCC
                                                                                                                                                                                                                                                                                                                                                                                                                                           GGCGTGAGCCACCACGCC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Nelson MR,
                                   Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Page 84; 286pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                 2002US-0429136P.
2003US-0490234P.
                                                                                                                                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                                        cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       INC.
                                                                                                                                                                                                                                                                                                                                                         DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   7 C; 6 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Braun
                                    Braun
                                                                                                                                                                                                                                                                                                                                                         18
                                                                                                                                                                                                                                                       gene therapy; human;
                                                                                                                                                                                                                                                                                                                                                         ₽₽
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 16.4; DB 1;
Pred. No. 1.5e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Kammerer SM,
                                      Kammerer
                                      SM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Reneland
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                                      Reneland
                                                                                                                                                                                                                                                        88;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                        primer; PCR; SNP
                                    <del>بر</del>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
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Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPKIO, KIAAO861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample
                                                                                                                                                           from a subject.
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6 98; 289pp; English.

of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current sequence is that of an Extend primer (also described as probe) the invention which was used to genotype human Rho family guanine-nucleotide exchange factor KIAAO861 gDNA which has been mapped to The invention relates to a novel method for identifying a subject at of breast cancer comprising detecting the presence or absence of one chromosomal position 3q27.3. , e of f

Sequence 18 BP; 4 A; 7 C; 2 ភ ភ T; 0 U; 0 Other;

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                           Best Loc
Matches
                                         Query Match
                                    Local
             728 GAGTAGCTGGGACTACAG
18
                           l Similarity
17; Conserv
GAGTAGCTGGGATTACAG 1
                            Conservative
                                   1.7%;
               745
                            0;
                                    Score
Pred.
                              Mismatches
                                    16.4;
No. 1
                                  DB 1;
.5e+03;
                                           Length
                              Indels
                              0;
                              Gaps
                              0
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RESULT 1612 AAC92328/c ID AAC9232 Human teratocarcinogenesis related protein AAC92328 standard; DNA; 19 Human; teratocarcinoma; hTera; 22-MAR-2001 AAC92328; (first entry) ВP Tera; teratocarcinogenesis; PCR primer; PCR primer SEQ ID NO:5.

Homo sapiens

CN1268566-A.

04-OCT-2000.

02-MAR-2000; 2000CN-00111771

02-MAR-2000; 2000CN-00111771

(SCHR-) SOUTH CHINA RES CENT NAT HUMAN GENE GROU

Gao X, Xiao Ξ Qian B

ildm 2001-050470/07.

New human teratocarnogenesis related protein and its coding sequence.

Example 1; Page 10; 21pp; Chinese

The present invention describes the human teratocarcinogenesis related protein, designated hTera, which is expressed in normal human marrow. Also described is a method for the preparation of the hTera protein and nucleic acid sequences, and a method of detecting human hTera nucleic acid and polypeptide sequences in sample. The present sequence represent a PCR primer used in the isolation of hTera in an example from the a PCR primer used present invention represents and

Sequence 19 BP; 6 A; w ç 7 ė, w Ţ, 0 Ç 0 Other

Length 19;

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RESULT 1613
AAS13553
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                                                         Query Match
Best Local S
Matches 17
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Matches
                                                                                                                                                           The present invention relates to the isolation of novel human and mouse VMGLOM polypeptides (long form and short form), and the nucleic acid molecules encoding them. VMGLOMs (also referred to as glomulins) are a subtype of venous malformations (VMs) called glomangiomas. In humans, VMGLOM has been mapped to chromosome 1p21-22. VMGLOMs and the nucleic acids encoding for them are useful as a medicament or for incorporation into a diagnostic kit. Such medicaments are useful for preventing, treating or alleviating disorders with a vascular component, particularly where alteration of vascular smooth muscle cell phenotype is needed, e.g. varicosities, cardiopathies or cardiomyopathies, cerebral disorders and cancer. The nucleic acids are also useful in gene thorapy. The present sequence for PCR primer 1 is used to amplify PAC 812f10 (54 T7) clone STS
                                                                                                                                                                                                                                                                                                                                                                                     New VMGLOM genes and polypeptides, useful in gene therapy or for preventing, treating or alleviating disorders with vascular component, e.g. varicosities, cardiopathies, cerebral disorders or cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human; VMGLOM; glomulin; venous malformation glomangioma; PCR primer; STS; sequence tagged site; PAC 812f10; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAS13553 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       16-FEB-2000; 2000EP-00870022.
10-APR-2000; 2000US-0195777P.
22-DEC-2000; 2000EP-00870320.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
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                                                                                                                 Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2001-557643/62.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO200160856-A2.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               PCR primer 1 used to amplify PAC 812f10 (54 T7)
                                                                                                                                              sequence in the methods of the present invention
                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page 70; 157pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16-FEB-2001; 2001WO-EP001760.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 23-AUG-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (UXTO-) UNIV
                             1111 CAGGCTGGTCTCAAACTC 1128
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17;
                                                       l Similarity
17; Conserv
N
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TIGGCTCACTGCAACTTC 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TTGGCTCACTGCAACCTC 687
CAGGGTGGTCTCAAACTC 19
                                                                                                                  BP; 4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           CATHOLIQUE LOUVAIN
                                                                       1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.78;
                                                                                                                  6 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0,
                                                         <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 16.4;
Pred. No. 1.
                                                                       Score 16.4;
Pred. No. 1.
                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1;
.6e+03;
                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  clone
                                                                                     Length 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
                                                          Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  STS sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gaps
                                                         Gaps
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RESULT 1614

21-NOV-2002

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                                                                                                                                                                                                                                          RESULT 1615
                                                                                                                                                                                                                                                                                                                                Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                          The invention describes a chimeric (transgenic) animal with functioning liver cells derived from another type of animal. The invention also details methods for testing toxicity of substances on the human liver cells and the metabolic conditions of substances by the liver cells. The
                                                                                                                                                                                                                                                                                                                                                                                  Sequence 19 BP; 5 A; 3 C; 10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Chimeric animal with functioning foreign liver cells for testing toxicity and metabolism of drugs.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mukaidani C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Chimeric animal; liver; liver metabolism; liver disorder; transgenic; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Reverse primer used to isolate human liver gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              09-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAS21179;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAS21179 standard; DNA; 19
                                                                                      Human; delta opioid receptor; OPRD1; ss; PCR; primer; SNP; single nucleotide polymorphism; eating disorder; anorexia energy homeostasis disorder; chromosome 1.
                                                                                                                                       Human delta opioid receptor OPRD1-1 sequencing/PCR primer PF-0081.
                                                                                                                                                                14-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                           the invention
                                                                                                                                                                                                                                                                                                                                                                                                                      invention also discusses methods for screening new treatments and drugs for human liver function disorder. This sequence is the reverse primer used to isolate a gene from human liver cells, described in the method of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2002-097571/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   19-MAY-2000; 2000JP-00149079.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           18-MAY-2001; 2001WO-JP004193
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     22-NOV-2001.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens.
                                     WO200292838-A2
                                                                                                                                                                                                                  ABX15007 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (NISC-) JAPAN SCI & TECHNOLOGY CORP.
                                                              domo sapiens.
                                                                                                                                                                                                                                                                                                         535
                                                                                                                                                                                                                                                                                19
                                                                                                                                                                                                                                                                                                                                 l Similarity
17; Conserv
                                                                                                                                                                                                                                                                               CTCCTGCCTCAGTCTCCC
                                                                                                                                                                                                                                                                                                         CTCCTGCCTCAGCCTCCC 552
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Page 12; 26pp;
                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Yoshizato K,
                                                                                                                                                                                                                                                                                                                                            1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ВÞ
                                                                                                                                                                                                                   BP.
                                                                                                                                                                                                                                                                                                                                 <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Furukawa
                                                                                                                                                                                                                                                                                                                             Pred. No. 1.00
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                    G; 1
                                                                                                                                                                                                                                                                                                                                             Score 16.4; DB 1; Length 19; Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                    T; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     H
                                                                                                                                                                                                                                                                                                                                                                                    <u>ر</u>
                                                                                                                                                                                                                                                                                                                                                                                    0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              toxicity;
                                                                                                   anorexia nervosa;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              human;
                                                                                                                                                                                                                                                                                                                                   0,
                                                                                                                                                                                                                                                                                                                                   Gaps
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                                                                                                                                                                                                                                                   RESULT 1616
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid molecule encoding a delta opioid receptor variant associated with an eating or energy homeostasis disorder, useful for diagnosing a genetic predisposition to such disorder, e.g. anorexia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                13-MAY-2002; 2002WO-US014940
                                                       Genetic marker selection; multiplex PCR amplification; prenatal diagnostic testing; foetal sex determination; genetic identification; DNA profiling; DNA fingerprinting; forensic analysis; PCR; primer; ss.
                                                                                                         08-JUL-2003
                                                                                                                                     ACA88919 standard; DNA; 19 BP
                                                                                                                                                                                                                                  Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (BIOI-) BIOINVEST LTD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 11-MAY-2001; 2001US-0290016P
                                                                                          Selection and amplification of genetic markers PCR related
                                                                                                                       ACA88919;
14-OCT-2002; 2002WO-AU001388.
                            WO2003031646-A1
                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       2003-129306/12
                                                                                                                                                                                        361
                                                                                                                                                                                                     l Similarity
                                                                                                                                                                          _
                                                                                                                                                                                                                                                surrounding a single nucleotide polymorhism
                                                                                                                                                                                                                                   19
                                                                                                                                                                                   TCAAGCAGTCCACCTGCC
                                                                                                                                                                          TCAAGCAATCCACCTGCC 18
                                                                                                                                                                                                                                  B₽;
                                                                                                                                                                                                      Conservative
                                                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                    22; 39pp; English.
                                                                                                                                                                                                                                  5 A.
                                                                                                                                                                                                             1.7%;
                                                                                                                                                                                                                                  9 C; 2
                                                                                                                                                                                        378
                                                                                                                                                                                                      0
                                                                                                                                                                                                                                  G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                      Score 16.4; D
Pred. No. 1.6e
O; Mismatches
                                                                                                                                                                                                             6e+03;
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                                                                                                                                                                                                                    1.
                                                                                                                                                                                                       1.
                                                                                                                                                                                                                    Length 19
                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                 (SNP)
                                                                                            primer
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                                                                                                                                                                                                       Gaps
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RESULT 1617
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                12-OCT-2001;
12-OCT-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             multiplex PCR amplification from limiting amounts of target nucleic aci The methods are also useful for improving genetic diagnostic and screening methods, such as prenatal diagnostic testing, foetal sex determination or genetic identification, e.g. DNA profiling or DNA fingerprinting. The nucleic acid sequence amplification is also useful forensic analysis of degraded, old, ancient and difficult samples that are difficult to amplify and identify. This sequence represents a PCR are difficult to amplify and identify. This sequence represents a PCR are difficult to amplify and identify.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The invention describes a method of selecting genetic markers as targets for nucleic acid sequence amplification comprising selecting each of the genetic markers according to a heterozygosity index of 0.5 or greater. Selecting and amplification of genetic markers are useful as targets for selecting and amplification for genetic testing or facilitating nucleic acid sequence amplification, for genetic testing or facilitating amounts of target nucleic acid.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Selecting genetic markers as targets for nucleic acid sequence amplification, useful for improving genetic testing, e.g. fetal determination, comprises selecting each of the genetic markers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 19.
                                                          16-JUL-2001; 2001US-0305153P.
20-JUL-2001; 2001US-0306440P.
13-JNOV-2001; 2001US-0312B5EP.
19-DEC-2001; 2001US-0340843P.
19-DEC-2001; 2001US-0340844P.
                                                                                                                                                                                                                                                                                                   Eating disorder; polymorphism; dataset; allele; HGBASE identification; serotomin receptor 1D; delta-opioid receptor; dopamine receptor D2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 36; Page 39; 64pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2003-381725/36
                                                                                                                                                                                                                                                        Unidentified
                                                                                                                                                                                                                                                                                                                                                  Opioid receptor D1 PCR primer SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                     ABT34249;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   ABT34249 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                primer used in the selection and amplification of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (UYQU ) UNIV
                                                                                                                                                                                          13-FEB-2003.
                                                                                                                                                                                                                        WO2003012143-A1
                                                                                                                                                                                                                                                                                       anorexia nervosa;
                                                                                                                                                                                                                                                                                                                                                                                     12-JUN-2003
                                                                                                                                                           16-JUL-2002; 2002WO-US022555
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          a heterozygosity index.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                392
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  N
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                l Similarity
17; Conserv
                               PRICE FOUND LTD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               GTGCTGGGATTACAGGCG 409
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  GTGCTGGTATTACAGGCG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matthews
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        2001AU-00008234.
2001AU-00008235.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        QUEENSLAND
                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                3 A;
                                                                                                                                                                                                                                                                                       r lD; delta-opioid receptor; dopamine receptor bulimia nervosa; PCR; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          PĽ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                3 C; 7 G; 6 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mulcahy BK
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 16.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                         <u>3</u>5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 genetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   markers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0
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'n

Bergen AW,

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   RESULT 1618
ADH70769
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                           Addison's disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; degenerative nervous system disease; multiple sclerosis; Alzhaimer's disease; bypersensitivity disease; type I hypersensitivity; Goodpasture's syndrome; allergy; type II hypersensitivity; leprosy; infectious disease; viral infection; type IV hypersensitivity; leprosy; infectious disease; viral infection; HIV; fungal infection; parasitic infection; schietosome; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        comprising a variant gene associated with an eating disorder and select from any of 119 polymorphisms with their corresponding genotyping in dataset, alleles and HGBAGE identification, given in the specification. The novel nucleic acid molecule has polymorphisms in the serotonin receptor 1D, delta-opioid receptor, or dopamine receptor D2, which is useful in diagnostic and prognostic assays for eating disorders, in particular anorexia nervosa and bulinia nervosa. This polymucleotide sequence represents a opioid receptor 1D PCR primer of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         and
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New
Kit for diagnozing and treating T-cell associated diseases e.g.
                               WPI; 2004-059052/06
                                                              Hood LE,
                                                                                                                                                                                                                                                                                                                                                                                                                                                           human; T-cell associated disease; Vbeta; autoimmune disease; degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human Vbeta
                                                                                           (HOOD/)
(ROWE/)
                                                                                                                                                                                           05-MAR-1999;
                                                                                                                                                                                                                                                      US2002150891-A1
                                                                                                                                                                                                                                                                                       Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            25-MAR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADH70769 standard; DNA; 19
                                                                                                                                           19-SEP-1994;
19-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    delta-opioid receptor, or dopamine receptor D2, useful in dia prognostic assays for eating disorders, such as anorexia and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     nucleic acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     361
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1 Similarity
17; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       _
                                                                                                                                                                                                                                                                                                                      cancer;
                                                                                             ROWEN L.
                                                                                                            HOOD L E.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       TCAAGCAATCCACCTGCC 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TCAAGCAGTCCACCTGCC
                                                            Rowen L;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         gene repeat sequence #559.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BP; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          relates to
                                                                                                                                           94US-00309335.
95US-00531241.
                                                                                                                                                                                         99US-00263959
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    molecule having polymorphisms in the serotonin receptor receptor, or dopamine receptor D2, useful in diagnostic seavs for eating disorders, such as anorexia and bulimia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               9 C; 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        þ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        novel isolated nucleic acid molecule
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               G; 3 T; 0 U; 0 Other,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                16.4; DB 1;
No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           disorder and selected
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Gaps
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autoimmune, degenerative nervous system and infectious disease, comprises nucleic acid primers specifically priming and allowing amplification of a

Disclosure; SEQ ID NO 963; 164pp; English

atrophic gastritis. Degenerative nervous system diseases include multiple sclerosis and Alzheimer's disease. Hypersensitivity diseases include Type I hypersensitivities such as contact with allergens that lead to allergies, Type II hypersensitivities such as those present in Goodpasture's syndrome and Type IV hypersensitivities such as those manifested in leprosy. Infectious diseases include viral infectious caused by viruses such as HIV, fungal infections such as those caused by the yeast genus Candida, parasitic infections such as those caused by schistosomes, filaria and bacterial infections such as those caused by Mycobacterium. Neoplastic diseases include lymphoproliferative diseases such as leukaemias, lymphomas and cancers such as cancer of the brain, The invention relates to a kit for diagnosing and treating T-cell associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, VbetaRNA or CDNA. The kit is useful for diagnosing organ transplant rejection and diagnosing and treating T-cell associated diseases including autoimmune diseases, degenerative nervous system diseases, graft versus host disease, hypersensitivity diseases, infectious disease and neoplastic diseases. Autoimmune diseases include Addison's disease, Sequence breast. The present sequence represents a Vbeta gene repeat sequence 19 BP; 3 A; 0 C; 0 G; 16 T; 0 U; 0 Other; diseases

Query Match
Best Local Similarity
Matches ` 17; Conser Conservative 1.78; 0; Score 16.4; DB 1; Pred. No. 1.6e+03; Mismatches ۲. 1: Length Indels <u>,,</u> Gaps 0

밁 á 428 _ TTTTATTTTATTTTTTT 445 18

RESULT 1619 ADH71084 ID ADH7108 ADH71084 standard; DNA; 19 (first entry)

allergy; type II hypersensitivity; Goodpasture's syndroms; type IV hypersensitivity; leprosy; infections disease; viral infection; HIV; fungal infection; Candida; parasitic infection; schistosome; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer; breast cancer; ss; primer; microsatellite. Addison's disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; Alzheimer's disease; hypersensitivity disease; type I hypersensitivity; degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease; Human Vbeta microsatellite primer Homo sapiens human; T-cell associated disease; Vbeta; autoimmune disease; #27.

US2002150891-A1

05-MAR-1999; 9908-00263959

19-SEP-1994; 19-SEP-1995; 94US-00309335 95US-00531241

T GOOH (/GOOH)

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ADH70436/c
ID ADH704
XX
AC ADH704
AC ADH704
AC ADH704
AX
DE Human
XX
KW Human
KW Hypers
KW Addisc
KW Addisc
KW ALzhei
KW Lymphx
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to a kit for diagnosing and treating T-cell cc associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, CC VbetaRNA or CDNA. The kit is useful for diagnosing organ transplant CC rejection and diagnosing and treating T-cell associated diseases. CC including autoimmune diseases, degenerative nervous system diseases, CC graft versus host disease, hypersensitivity diseases, infectious diseases, CC and neoplastic diseases, hupersensitivity diseases, infectious diseases, CC and neoplastic diseases, autoimmune diseases include Addison's diseases, CC artophic gastritis. Degenerative nervous system diseases include multiple control of the past such as contact with allergens that lead to CC allergies, Type II hypersensitivities such as those present in CC Goodpasture's syndrome and Type IV hypersensitivities such as those caused by viruses such as HIV, fungal infections such as those caused by CC graft genus Candida, parasitic infections such as those caused by CC such as genus Candida, parasitic infections such as those caused by CC such as leukaemias, lymphomas and cancers such as cancer of the brain, CC such as Indexended to the past. The present sequence represents a Vbeta microsatellite primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             RESULT 1620
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                                                                                                                                                                                                                                                                                                  human; T-cell associated disease; Wbeta; autoimmune disease; degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease; hypersensitivity disease; atrophic gastritis; addison's disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; Alzheimer's disease; hypersensitivity disease; type I hypersensitivity; doodpasture's syndrome; allergy; type II hypersensitivity; Goodpasture's syndrome; type IV hypersensitivity; leprosy; infectious disease; viral infection; HIV; fungal infection; Candida; parasitic infection; schistosme; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Hood
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 19 BP; 3 A; 7 C; 4 G; 5 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human Vbeta gene repeat sequence #226.
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                                                                                                                                                                                  Homo sapiens.
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17; Conserv
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                                                                                                                                                                                                                                                                           cancer;
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Pred. No. 1.6e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             19-SEP-1994;
19-SEP-1995;
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25-MAR-2003; 2003WO-JP003623
                                                                                                                                                                                         human; hepatocyte; proliferation; human hepatocyte transplantation; immunodeficient hepatopathy; liver; PCR; primer; ss.
                                                                                                                                                                                                                                                      Human hepatocyte related PCR primer R SEQ ID NO:2.
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                                           02-OCT-2003
                                                                                   WO2003080821-A1
                                                                                                                              Synthetic
                                                                                                                                                   Homo sapiens.
                                                                                                                                                                                                                                                                                                    06-MAY-2004
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19 TTTTATTTTATTTTATTT 2
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I Similarity 94.4%;
17; Conservative
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95US-00531241.
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Pred. No. 1.6e+03;
0; Mismatches 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              T; 0 U; 0 Other;
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ADP26951/c
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  hair growth modulator; P-cadherin modulator; endocrine; depilatory; gene therapy; antisense therapy; hair growth; alopecia; baldness; unwanted hair growth; hirsutism; hypotrichosis associated with juvenile macular dystrophy; HJMD; hum P-cadherin; PCR; primer; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 19
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WPI; 2004-469945/45
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                                                       Sprecher E,
                                                                                                                                                                                                                                                                                                                                                                                          EP1428893-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
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                                                                                                                                                                                                        15-OCT-2002; 2002US-0418163P
                                                                                                                                                                                                                                                                  10-OCT-2003; 2003EP-00256411
                                                                                                                                                                                                                                                                                                                             16-JUN-2004.
                                                                                                                 (SPRE/) SPRECHER E.
(BERG/) BERGMAN R.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            535 CTCCTGCCTCAGCCTCCC 552
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   invention.
                                                    Bergman
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    juvenile macular dystrophy; HJMD; human;
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No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
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Identifying a hair growth modulator for treating alopecia and unwanted hair growth such as hirsutism, comprises identifying a P-cadherin modulator and testing whether the P-cadherin modulator is functional as
                                                                                                                                                                      hair growth modulator
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Example; SEQ ID NO 52; 121pp; English

CC The present invention describes a method (M1) for identifying a hair CC growth modulator. (M1) comprises identifying a P-cadherin modulator, and CC testing whether the P-cadherin modulator is functional as a hair growth CC modulator. Also described: (1) a hair growth modulator (1) identified by CC (M1); and (2) a composition (II) for modulating hair growth, comprising, CC as an active ingredient, a P-cadherin modulator functional as a hair CC growth modulator. (I) and (II) have endocrine and depilatory activities, CC and can be used as hair growth modulators, P-cadherin function CC modulators, and in gene and antisense therapy. (M1) is useful for CC identifying a hair growth modulator. (1) is useful in a method of medical CC treatment. (I) or (II) is useful for modulating hair growth for non-CC (I) or (II). (I) can be used in the manufacture of a medicament for the therapeutic modulation of hair growth. (I) or (II) is useful for treating CC (II) comprising P-cadherin inducer is useful for correction of hair loss in congenital hypotrichosis associated with juvenile macular dystrophy (CC invention.) and other alopecia patients. The present sequence represents a PCR conjunction. nvention.

Sequence 19 BP; 5 A; 3 C; 8 G; 3 T; 0 U; 0 Other;

Query Match Best Local S Matches 17 Local Similarity mes 17; Conserv Conservative 1.7%; 0 Score 16.4; Pred. No. 1. Mismatches .6e+03; DB 1; Length 19; Indels 0 Gaps 0

밁 5 930 TCTCACTCTGTTACCCAG 947 18 TCTCACTCTGTCACCCAG ب

AAQ95565 standard; DNA; 20

14-FEB-1996 (first entry

Primer A7 (Group 4, set C) for a human chromosomal marker.

primer; polymerase chain reaction; PCR; linkage study; locus; microsatellite marker sequence; automated genotyping; allele; polymorphism; detection; Homo sapiens; ss.

Synthetic.

WO9515400-A1

08-JUN-1995

05-DEC-1994; 94WO-US013945

03-DEC-1993; 93US-00160837

VIND (OCYU) JOHNS HOPKINS

WPI; 1995-215278/28.

RESULT 1623
AAQ95565
AC AAQ9556
AC AAQ9556
AC AAQ9556
AC Primer
XX Primer
XX Primer
XX Primer
XX Polymoz
XX Mo95154
XX W095154
XX W095154
XX PD 08-UUNXX P Kit for automated genotyping contg. pairs of PCR primers - amplify polymorphic nucleotide repeat sequences, arranged i with a characteristic fluorescence label, useful e.g. in de arranged in e.g. in dete designed to

disease

related

genetic 70-2;

rearrangement

Fig

104pp;

English.

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RESULT 1624
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               polymorphic, simple sequence repeats and can be used in automated genotyping, esp. fluorescence-based. The primers correspond to the unique DNA sequence surrounding each marker, and PCR is used to detect each polymorphism. When the MMS show considerable polymorphism (ie. a difference in the number of repeats) between individuals, the markers can be particularly informative. The MMS can be ideal for linkage studies. Kits comprise at least 4 groups, of at least 3 sets, each comprising labelled primers for PCR amplification of the DNA. Group 4 primer pairs are shown in AAQ95465-480 and AAQ95559-590. The chromosomal markers, published size range of the allele and degree of heterozygosity in the population for the markers covered by these primer pairs are not given in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The method aims to provide a collection of highly reproducible microsatellite marker sequences (MMS) at approx. 10-50 cM into throughout the human genome which can be detectably labelled.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence
                                                                                                                   Kit for automated genotyping contg. pairs of PCR primers - de amplify polymorphic nucleotide repeat sequences, arranged in with a characteristic fluorescence label, useful e.g. in dete
           The method aims to provide a collection of highly reproducible microsatellite marker sequences (MMS) at approx. 10-50 cM intervathroughout the human genome which can be detectably labelled. The polymorphic, simple sequence repeats and can be used in automated
                                                                                                                                                                           WPI; 1995-215278/28
                                                                                                                                                                                                      Levitt
                                                                                                                                                                                                                                                          03-DEC-1993;
                                                                                                                                                                                                                                                                                     05-DEC-1994;
                                                                                                                                                                                                                                                                                                                 08-JUN-1995
                                                                                                                                                                                                                                                                                                                                          WO9515400-A1
                                                                                                                                                                                                                                                                                                                                                                   Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                              polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                                            microsatellite
                                                                                                                                                                                                                                                                                                                                                                                                                       primer; polymerase chain reaction; PCR; linkage study;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   Primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15-FEB-1996
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAQ95680 standard;
  genotyping.
                                                                                  Disclosure;
                                                                                                                                                                                                                               VIND (OCAD)
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17; Conserv
                                                                                                            related
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                                                                                                                                                                                                                                                                                                                                                                                                                                                  (Group 6,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                Fig 7F-3; 104pp;
    simple sequence repeats and esp. fluorescence-based. The
                                                                                                                                                                                                                                JOHNS HOPKINS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                              marker sequence; automated detection; Homo sapiens; ss.
                                                                                                                                                                                                                                                           93US-00160837
                                                                                                                                                                                                                                                                                      94WO-US013945
                                                                                                          genetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   set C)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.7%;
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С;
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                                                                                                            rearrangement.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 16.4;
                                                                                 English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                   marker D8S265,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              8 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0 Other;
  primers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                           genotyping; allele,
                                                                                                                                                                                                                                                                                                                                                                                                                                                     chromosome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length
     correspond to the unique
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Indels
                                                                                                                                                                                                                                                                                                                                                                                                                          locus;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   20;
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                                                                                                                          detection
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                                          intervals
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                                The MMS
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RESULT 1625
AAH91108/c
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Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                     Human; inflammatory bowel disease; Crohn's disease; ulcerative colitis single nucleotide polymorphism; SNP; chromosome 19p13; paternity test; chromosome 5q31-33; forensic test; gene therapy; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Kits comprise at least 4 groups, of at least 3 sets, each comprising labelled primers for PCR amplification of the DNA. Group 6 primer pairs are shown in AAQ95639-686. The published size range of the D8S265 allele is 284-307 bp, and the degree of heterozygosity in the population is
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA sequence surrounding each marker, and PCR is used to detect each polymorphism. When the MMS show considerable polymorphism (ie. a difference in the number of repeats) between individuals, the markers be particularly informative. The MMS can be ideal for linkage studies.
                                                                                                                                                                                                                                                                                                                                     misc_feature
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 20 BP; 3
                                                                                                                                                                                                                                                                                                                                                Key
                                                                                                                                                                                                                                                                                                                                                                     Homo
                                                                                                                                                                                                                                                                                                                                                                                                                               Human inflammatory bowel disease associated polymorphic site
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAH91108;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAH91108
                                                                                                                                                                                                                                                                                                                                                                     sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             996 GGGCTCAAGCGATTCTCC 1013
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ω
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          GGGTTCAAGCGATTCTCC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first
                                                                                                                                                                                                                                                                                                                                       Location/Qualifiers
                                                                                                                                                                                                                                                                                                                     /note=
                                                                                                                                                                                                                                                                                                                                *tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       A; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         94.48;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       C; 5
                                                                                                                                                                                                                                                                                                                     "SNP, optionally
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        G; 7 T; 0 U;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Pred.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16.4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ŏ.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.6e+03;
                                                                                                                                                                                                                                                                                                                     A or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0 Other;
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                                                                                                                                                                                                                                                                                                                      T at
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                                                                                                                                                                                                                                                                                                                       this
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                                                                                                                                                                                                                                                                                                                      position"
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                                                                                                                                                                                                                                                                                                                                                                                                                                 #183
                                                                                                                                                                                                                                                                                                                                                                                                            colitis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       can
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0
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disease and correlating their recommendations, forensics, paternity used in this way for phenotypic correlations, forensics, paternity testing, medicine and genetic analysis. The present sequence is a nolumorphic site described in the exemplification of the invention The present invention describes a method for detecting the presence of polymorphisms associated with inflammatory bowel diseases such as ulcerative colitis and Crohn's disease. The methods can be used to detect the presence of genetic polymorphisms associated with inflammatory bowed disease and correlating their occurrence with disease states. They may detect þė

Testing for the prese bowel disease, using

for the presence of polymorphisms associated isease, using a hybridization assay.

with

inflammatory

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Daly M,

Hudson

녆

Lander

ES,

Rioux J,

Siminovitch

(WHED) (ELLI-)

WHITEHEAD INST BIOMEDICAL ELLIPSIS BIOTHERAPEUTICS

CORP.

RES

10-DEC-1999; 99US-0170257P. 10-APR-2000; 2000US-0196046P. 11-DEC-2000; 2000WO-US033632 14-JUN-2001 WO200142511-A2

Claim 1; Page 46; 463pp; English

Sequence 20 BP; œ A, ர ü w ç w 7; 0 <u>.</u> 1 Other;

BB

Length

20;

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RESULT 1626
ABL45527/c
ID ABL4552
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                                                                                                                                                                                          The present invention describes a method of arraying genome clones. The cmethod comprises: (a) clones of the genomic libraries contained in cc multiwell plates numbered for discrimination are mixed in each of the cc multiwell plates; (b) a primer designed based on the chromosome marker cc sequence is added to the mixture to carry out an amplification reaction; (c) a signal corresponding to the marker is detected from the resultant cc amplified product to specify the discrimination Nos. of the multiwell cc plates containing the clones having said marker sequence; (d) the order cof the markers is changed so that the same discrimination Nos. succeed to the maximum in the specified discrimination Nos. to array the multiwell cc plates; (e) the clones in the multiwell plates of the specified condiscrimination Nos. are mixed respectively in each wells of longitudinal cc and lateral directions; (f) the mixed clones are cultured and the cc resultant cultures are amplified by using the above primer; (g) signals care detected from the amplified products; (h) the clones in the multiwell plates are specified from the detected result; and (i) the clones are cc reconstituted as the positions on the chromosome and arrayed. The cc primers for human chromosome 1936-35 DNA, and ABL45322 represent CC represent por primers for human chromosome 1936-35 DNA, and ABL45321 to ABL45634
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Best Local Similarity
Matches 17; Conserv
                                                                 Matches
                                                                               Query Match
Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human chromosome
                                                                                                                                 Sequence 20 BP; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2002-144136/19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; chroner;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        11-APR-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 6; Page 56; 528pp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Arraying genome clones.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      10-MAR-2000; 2000JP-00066716
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       12-MAR-2001; 2001JP-00068285
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          20-NOV-2001
                                                                                                                                                               represent PCR primers for human chromosome 21q22.1, which are specifically claimed for use in the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (RIKA ) RIKAGAKU KENKYUSHO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          614
 19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        chromosome 1p36-35; chromosome 21q22.1; genetic analysis; genome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TTTTNGAGACGGAGTCTC 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          TTTTTTGAGACAGAGTCTC 632
 ACAGCTCACTGCAGCTTT 2
                      ACAGCTCACTGCAGCCTT
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                                                                 Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       21q22.1 PCR primer SEQ ID NO:2571.
                                                                                                                                 A; 4 C; 6 G; 4 T; 0 U; 0 Other;
                                                                               1.7%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.7%;
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                                513
                                                                0,
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Pred. No. 1.6e
0; Mismatches
                                                                                 Score 16.4; DB 1;
Pred. No. 1.6e+03;
                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 1;
                                                                                               1; Length 20;
                                                                   Indels
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                                                                0
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                                                                Gaps
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RESULT 1628
ABZ71060/c
ID ABZ7106
                                                                                                                                                                                                                                                                                           RESULT 1627
ACC55322/c
222222222
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Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                gene from a subject, and detecting the presence or absence of one or more variations in the ADAMTS13 gene. The method of the invention has thrombolytic and haemostatic activity. The methods and compositions of the present invention are useful for the diagnosis and treatment of, and/or analysing risks for thrombotic thrombocytopenic purpura. The present sequence is used in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human; thrombotic thrombocytopenic purpura; TTP; disintegrin; metalloproteinase; thrombospondin 1-like domains 13; ADAWTS13; thrombolytic; haemostatic; PCR; primer; RT-PCR; 5' RACE; 3' RACE; se
                                                                                                                                                                                                                                                                                                                                                                                                  The invention relates to a novel method for identifying subjects at risk of developing thrombotic thrombocycopenic purpura (TTP) disease, comprising providing nucleic acid having a disintegrin and metalloproteinase containing thrombospondin 1-like domains 13 (ADAMTS13)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Identifying risk of developing thrombotic thrombocytopenic disease, using a novel disintegrin and metalloproteinase cothrombospondin 1-like domains genes and proteases.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Ginsburg D,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human ADAMTS13
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                                    Human HKR1 phosphorothioate antisense oligonucleotide SEQ ID
                                                                                                                                                                                                                                                                                          Sequence 20 BP; 4 A; 3 C; 8 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example 1; Page 87; 98pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 16-AUG-2001;
16-AUG-2002;
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                                                                                          ABZ71060;
                                                                                                                   ABZ71060
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                                                                                                                                                                                                    ATCTCGGCTCACTGCAAC 984
                                                                                                                   standard; DNA;
                                                                                                                                                                                                                                         Conservative
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2002US-00312834.
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containing
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                                      NO:88
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Human; HKR1; cytostatic; HKR1 inhibitor; hyperproliferative disorder; cancer; antisense oligonucleotide; 2'-0-methoxyethyl; 2'-MOE; control;

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                                 S
                                                                                                                                                                                                            The present invention describes a compound 8-50 nucleobases in length CC targeted to, and which specifically hybridises with a nucleic acid CC molecule encoding HKR1, and inhibits the expression of HKR1. Also CC described: (1) a compound 8-50 nucleobases in length that specifically CC hybridises with at least an 8-nucleobase portion of an active site on a CC nucleic acid molecule encoding HKR1; (2) a composition comprising the CC compound and a carrier or diluent; (3) a method for inhibiting the CC expression of HKR1 in cells or tissues by contacting the cells or tissues when the compound so that expression of HKR1 is inhibited; and (4) a CC with the compound so that expression of HKR1 is inhibited; and (4) a cC with HKR1 by administering to the animal a therapeutic or prophylactic compount of the compound so that expression of HKR1 is inhibited. HKR1 CC amount of the compound so that expression of HKR1 is inhibited. HKR1 CC annissense oligonucleotides have cytostatic activities and can be used as CC HKR1 inhibitors. The compound, composition and methods are useful for CC treating a disease or condition associated with HKR1, such as a CC hyperproliferative disorder, e.g. lung, brain or breast cancer, by cinhibiting the expression of HKR1. They are also useful in research and CC diagnostics for modulating the expression of HKR1. The present sequence cc represents a human HKR1 chimeric phosphorothoate oligonucleotide having 2'-O-methoxyethyl (2'-MOE) wings and a deoxy gap, which is an antisense CC the present and the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the inhibition of human HKR1 in an example from the compound in the inhibitio
                                                                                                Query Match
Best Local (
                                                                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New compounds, particularly antisense oligonucleotides targeted to a nucleic acid encoding HKR1, useful for treating a disease/condition associated with HKR1, such as hyperproliferative disorder, e.g. lung.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                phosphorothioate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              brain or breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       03-JUL-2001; 2001US-00898556
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               02-JUL-2002; 2002WO-US021090
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                                                                                                                                                           Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (ISIS-) ISIS PHARM INC
                                                                                                                                                                                                 present invention
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                                                                                                Similarity
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                                     GAGTAGCTGGGACTACAG 745
                                                                                                                                                           BP; 4 A;
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                                                                                                1.7%;
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e= "2'-O-methoxyethyl (2'-MOE) nucleotides'
                                                                                                                                                           6 C; 3 G;
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                                                                             0,
                                                                                                Score 16.4;
Pred. No. 1.
                                                                                                                                                             7 T; 0 U; 0 Other;
                                                                                  Mismatches
                                                                                                     .6e+03
                                                                                                                        DB 1;
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                                                                                                                   Length 20;
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RESULT 1629
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ID ABT44200 standard; DNA; 20 BP
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                             Ś
                                                                                                                                                                                                Critically hybridise to novel chimeric antisense oligonucleotides that especifically hybridise to and inhibit the expression of the nucleotide combinding oligonucleotide domain 1, NOD1 protein. NOD1, also known as CARD4 (caspase associated recruitment domain 4) is a domain that is involved in the elimination of cells via programmed cell death and in the host combined to cell of the elimination of cells via programmed cell death and in the host combined to cell loss and neurodegenerative conditions including combined to cell loss and neurodegenerative conditions including combined to the development of lateral sclerosis (ALS), retinitis companies and blood cell disorders. Conversely, insufficient apoptosis can contribute to the development of cancer, autoimmune disorders and combined to the development of cancer, autoimmune disorders and combined to the development of cancer, autoimmune disorders and combined that can modulate NoD1 expression (and variants to cligonucleotides that can modulate NoD1 expression (and variants coligonucleotide sequence is the chimeric antisense oligo used to inhibit coligonucleotide sequence is the chimeric antisense oligo used to inhibit combined to the invention. Note that it has two combined to the development of the invention. Note that it has two combined to decreate the combined to the chimeric antisense oligonucleotide aga. The oligonucleotide backbone is phosphorothioate.
                                                                      Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Antisense; nucleotide binding oligonucleotide domain 1; gene therapy; ss; caspase associated recruitment domain 4; programmed cell death; cancer; apoptosis, Alzheimer's; neurodegenerative; Parkinson's; ALS; NODL; CARD4; amyotrophic lateral sclerosis; retinitis pigmentosa; autoimmune disorder;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New compound, comprising a sequence targeted to a nucleic acid encoding nucleotide-binding oligomerization domain 1 (NOD1), useful for preparing a composition for treating hyperproliferative disease, e.g., cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  19-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              viral infection; human; chimeric.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Chimeric antisense oligonucleotide ISIS 199196 to
                                                                                                                                               Sequence 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 3; Page 76; 138pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2003-577293/54
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (ISIS-) ISIS PHARM INC
                               1019 CAGCCTCCCAAGCAGCTG
18
                                                                        1 Similarity
17; Conserv
CTGCCTCCCAAGCAGCTG 1
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                                                                          Conservative
                                                                                                                                                 BP; 4
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C;
                                                                                      1.7%;
                                                                                                                                                   9
                                     1036
                                                                      Score 16.4; I pred. No. 1.6e 
0; Mismatches
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                                                                                                                                                   G; 3 T; 0
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                                                                                            1.6e+03
                                                                                                                                                     0 Other
                                                                                                              DB 1;
                                                                                                              Length 20;
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                                                                              Indels
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                                                                            Gaps
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RESULT 1630 ADE15817/c ID ADE1581

ADE15817 standard; DNA; 20

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ABZ99052
ID ABZ
XX
AC ABZ
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DT 17-1
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DE Hum
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KW Hum
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Best Local S
Matches 17
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2'-5' phosphodiesterase; hepatitis C; virucide; hepatotropic;
gene therapy; vaccine; human.
                                                                                                                                                                                                                                                                                                                                                                             and hepatotropic activity. A polynucleotide of the invention may have a use in gene therapy, or in a vaccine. The compound capable of modulating the level of activity of the OAS, RNase L or 2'-5' phosphodiesterase gene and/or activity of the OAS, RNase L or 2'-5' phosphodiesterase grotein is useful in the manufacture of a medicament for treating a patient with or at risk of hepatitis C infection. The nucleic acid that hybridises selectively to OAS nucleic acid is useful in the manufacture of a medicament or diagnostic reagent for treating or diagnosting a patient with or at risk of hepatitis C infection. The present sequence is used in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The invention relates to a novel compound capable of modulating the level of activity of the 2',5'-oligoadenylate synthetase (OAS), RNase L or 2'-5' phosphodiesterase gene or protein, useful in the manufacture of a medicament for treating a patient with or at risk of hepatitis C infection, where the compound is not an interferon or an isoprenoid, such as geranylgeranylacetone (GGA). The method of the invention has virucide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Use of a compound capable of modulating the level of activity of the OAS, RNase L or 2'-5' phosphodiesterase gene or protein in the manufacture of a medicament for treating a patient with or at risk of hepatitis C
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo
                              Human PDE4C oligonucleotide sequence
                                                                  17-OCT-2003
                                                                                                                                                                                                                                                                                                                                                  Sequence 20 BP; 3 A; 7 C; 4 G; 6 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    19-APR-2002; 2002GB-00008928
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Human; antisense; lung dysfunction; nasal airway dysfunction;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     15-APR-2003; 2003WO-GB001625
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WO2003089003-A1
                                                                                                                                  ABZ99052 standard;
                                                                                                                                                                                                                                                   946 AGGCTGGAGTGCAATGGC
                                                                                                                                                                                                                   20
                                                                                                                                                                                                                                                                                                   Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Page 43; 67pp; English.
                                                                                                                                                                                                                                                                                  ilarity 94.4%;
Conservative
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                                                                 (first entry)
                                                                                                                                  DNA;
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                                                                                                                                  ВP
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                               Length 20;
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RESULT 1632 ABD32083 ID ABD3208

ABD32083

standard;

DNA;

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Matches Query Match Best Local

l Similarity 17; Conserv

Conservative

0;

Mismatches

Indels

<u>.</u>

Gaps

0

1.7%;

Score 16.4; DB 1; Length 20; Pred. No. 1.6e+03;

614 TTTTTTGAGACAGAGTCT 631

18

ZXBXBXX

29-JUL-2004

(first entry)

Human; antisense; bronchoconstriction; allergy; hyposecretion; pain;

Human PDE4C-derived oligonucleotide SEQ ID 14294.

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cc junctions of genes encoding a polypeptide associated with lung and/or cc nasal airway dysfunction and a second active agent comprising an cc antiinflammatory steroid and ubiquinone. A composition of the invention cc has antiinflammatory, antiallergic, antiasthmatic, hypotensive, has antisinflammatory, antiallergic, antiasthmatic, hypotensive, cc use in antisense gene therapy. The composition is useful for treating or cc use in antisense gene therapy. The composition is useful for treating or cc reventing a respiratory, lung or malignant disease or condition, also composition as useful for treating or cc rentancing the prophylactic or therapeutic respiratory effect of an antiinflammatory steroid in a subject, for reducing or depleting levels of of or reducing sensitivity to adenosine, reducing or depleting levels of of creeptor, producing bronchodilation, increasing levels of adenosine cc lung surfactant in a subject stissue, or treating bronchoconstriction. Cc lung inflammation, lung allergies, or a respiratory disease or condition. Cc Note: The sequence data for this patent is not represented in the printed capacition, but was obtained in electronic format directly from WIPO as ferrowers.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Pharmaceutical composition for treating ailments associated with impaired respiration, has oligo(s) antisense to specific gene(s) or its corresponding RNAs, and glucocorticoid or non-glucocorticoid steroid or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                antiasthmatic; hypotensive; immunosuppressive; cytostatic; gene trantisense gene therapy; respiratory; lung adenosine sensitivity; adenosine receptor; bronchodilation; bronchoconstriction; lung allung inflammation; respiratory disease; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The invention relates to a novel pharmaceutical composition, which has first active agent comprising an oligonucleoties antisense to the initiation codon, coding region, 5 or 3 end genomic flanking regions, 5 and 3 intron-exon junctions, or regions within 2-10 nucleotides of
Sequence 20 BP; 3 A; 2 C; 5 G; 10 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; SEQ ID
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2003-229219/22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Miller S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              24-APR-2001; 2001US-0286137P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          antiinflammatory steroid; ubiquinone; antiinflammatory; antiallergic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (EPIG-)
                                                                                   ftp.wipo.int/pub/published_pct_sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     EPIGENESIS PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Li Y, Sa
, Tang L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sandrasagra A, K
L, Shahabuddin S;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            NO 14294; 872pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Katz E, Pabalan
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Ç
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Aguilar
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         which has a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      allergy;
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CC expression of a target polypeptide associated with lung airway or lung content of a target polypeptide associated with lung airway or lung content on a lab describes a kit, that comprises: (a) a delivery device, in separate containers, (b) the oligonucleotides, (c) instructions for adding a carrier and for use of the kit. The composition of the invention has antiallergic, antiinflammatory, antiasthmatic, and beta-adrenergic agonist. The composition is useful for preventing or treating a respiratory, lung or malignant disease. The administered composition comprises oligo and is administered to reduce the production or availability, or to increase the degradation of the target mRNA or to reduce the amount of target polypeptide present in the lungs. The pulmonary obstruction, and/or bronchoconstriction and/or lung cinflammation, allergies and/or surfactant hypoproduction are associated with a disease or condition such as pulmonary vasoconstriction, conformation, allergies, asthma, impeded respiration, respiratory construction, allergies, asthma, impeded respiration, respiratory transplantation rejection, pulmonary vasoconstriction, respiratory construction, allergies, asthma, impeded respiration, respiratory construction, pulmonary pulmonary disease, pulmonary pulmonary disease, pulmonary pulmonary disease, pulmonary infections, bronchitis or cancer. The reduced adenosine content of the anti-sense oligos corresponding to thymidines present in the target RNA serves to prevent the breakdown of the oligonucleotides into products that free adenosine into the system ce.g., lung, brain, heart, kidney, etc, tissue environment and thereby, to prevent any unwanted effects due to it
                                                                                                                                  Matches
                                                                                                                                                                  Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            comprising oligonucleotides, effective for alleviating bronchoconstriction, respiratory tract inflammation, allergies and reducing adenosine sensitivity, levels of adenosine (A) or (A) recept surfactant depletion or hyposecretion, when administered to a mammal oligonucleotides are derived from a gene encoding or regulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        emphysema; chronic obstructive pulmonary disease; cancer; bronchitis; pulmonary transplantation rejection; ss; primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          surfactant depletion; antiallergic; antiinflammatory; antiasthmatic; analgesic; hypotensive; immunosuppressive; cytostatic; cystic fibrosis; beta-adrenergic agonist; respiratory disease; pulmonary vasoconstriction; respiratory distress syndrome; allergic rhinitis; pulmonary hypertension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Pharmaceutical composition for treating asthma, has antisense oligonucleotide containing less percentage of adenosine, targeted nucleic acids associated with lung airway or lung dysfunction, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        24-APR-2001; 2001US-0286036P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   bronchodilating agent.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                23-APR-2002; 2002WO-US013143
                                                                                                                                                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      This invention describes a novel composition (a) a first active agent,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (EPIG-)
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                                                                                                                                  15; Conservator
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           EPIGENESIS PHARM INC
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                                               TTTTTTGAGACAGAGTCT
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                                                                                                                                                                                                                                                                        B₽;
                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                        3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Ļ
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                                                                                                                                                                                                                                                                        2 C;
                                                                                                                                                                  1.78;
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                                                                 631
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                                                                                                                                                                                                                                                                        G; 10 T;
                                                                                                                                                               Score 16.4;
Pred. No. 1.
                                                                                                                                         Mismatches
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                                                                                                                                                                                                                                                                        0 U;
                                                                                                                                                                      1.6e+03
                                                                                                                                                                                                   DB 1; Length 20;
                                                                                                                                                                                                                                                                           0 Other;
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                                                                                                                                         Indels
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RESULT 1634 ADI38842/c ID ADI3884 XX

ADI38842 standard; DNA; 20

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CAGCCTCCCAAGCAGCTG 1036

Matches 17;

Conservative

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Mismatches

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Gaps

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RESULT 1633
ADH56987/c
ID ADH5698
XX ADH5698
                           Query Match
                                                                                                                                               susceptibility, as well as diagnosis, prevention and treatment of various disorders including chronic obstructive pulmonary disease, rheumatoid arthritis, inflammatory bowel disease, psoriasis or asthma. Accordingly, the compositions of this invention exhibit antiasthmatic, antiinflammatory and antiallergic activities. Furthermore, they may be used to identify patients that would be strong candidates for effective treatment with a CARD4 modulator, in pharmacogenomics, or in monitoring the effects of CARD4 therapeutics during clinical trials. The nucleic acid molecule may also be used in forensics or paternity testing. This oligonucleotide sequence is a PCR primer used to amplify a human CARD4 DNA oligo comprising an allelic variant of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        This invention relates to novel single nucleotide polymorphisms within the human CARD4 gene. Specifically, it refers to allelic variants of CARD4 (NOD1), a member of the CED4/Apaf-1 family that is involved in caspase-9 induced apoptosis and inflammation. The present invention describes a kit for determining the allelic variants of CARD4 polymorphic regions of an individual, which can be useful for predicting
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New isolated nucleic acid molecule comprising CARD4 gene, useful for diagnosing, preventing apoptotic, inflammatory or allergic disorder,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   antiasthmatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       inflammation; chronic obstructive pulmonary disease; rheumatoid arthritis; inflammatory bowel; psoriasis; asthma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            PCR primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADH56987;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Example 6;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2004-010870/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Barnes G,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         27-MAR-2002; 2002US-0368184P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          27-MAR-2003; 2003US-00401194.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             paternity testing;
                                                                                            Sequence 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (BARN/) BARNES
(BERT/) BERTIN
Local
Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SEQ ID NO 75; 77pp; English.
                                                                                            BP; 3 A; 4 C; 9 G; 4 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               antiinflammatory; antiallergic; pharmacogenomic; forensic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                to amplify human CARD4 DNA oligo allelic variant SeqID75
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             PCR; primer.
94.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     20
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP
                                     Score 16.4;
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   ö.
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                                     DB 1;
                                                                                                  0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             an allelic variant of a or treating asthma or a or in pharmacogenomics.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  induced apoptosis;
                              Length 20;
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Best Local S
Matches 17
                                                                                                                                   The invention describes a compound 8-80 nucleobases in length targeted to a nucleic acid molecule encoding LIM domain kinase 1. The compound specifically hybridises with the nucleic acid molecule encoding LIM domain kinase 1 and inhibits the expression of LIM domain kinase 1. It specifically hybridises with at least an 8-nucleobase portion of a preferred target region on the nucleic acid molecule encoding LIM domain kinase 1. The antisense oligonucleotide is useful for modulating the expression of LIM domain kinase 1 in cells or tissues to treat diseases associated with their expression, such as a developmental disorder or a neurological disorder. In addition, the compound is used for diagnostics, prophylaxis, or as research reagents or kits. This sequence represents a human LIM domain kinase 1 antisense oligonucleotide.
                                                                                                            Sequence 20
                                                                                                                                                                                                                                                                                                                                                       New antisense oligonuclectides for modulating LIM domain kinase 1 expression, useful for diagnosing, preventing or treating conditions associated with the kinase, e.g. neurological or developmental disorders.
                                                                                                                                                                                                                                                                                                                                                                                                                                              Cowsert LM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          US2004014047-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              neuroprotective; LIM domain kinase 1; developmental disorder; neurological disorder; diagnostic; prophylaxis; human; ss:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human LIM domain kinase 1 antisense oligonucleotide #126
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    22-APR-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                18-JUL-2002; 2002US-00199199
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              22-JAN-2004
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19
                                                     1 Similarity
17; Conserv
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                         CTGCCTCCCGGGTTCAAG 704
                                                                                                           BP; 5
                                                                                                                                                                                                                                                                                                                              SEQ ID NO 141; 81pp; English
                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                              Dobie KW;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
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/mod_base= OTHER
/mote= "OTHER= 2'.-O-Methoxyethyl (2'-MOE)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        mod_base= OTHER
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  note= "OTHER= Phosphorothioate backbone.
                                                                                                            A; 5 C; 7 G; 3 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              base= OTHER
                                                                    94.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          "OTHER= 2'-O-Methoxyethyl
N
                                                     0;
                                                                   Score 16.4; DB 1;
Pred. No. 1.6e+03;
                                                       Mismatches
                                                                                 DB 1;
                                                                                Length 20;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (2'-MOE)
                                                       Indels
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RESULT 1635 ADI38784 ID ADI3878

ADI38784 standard; DNA; 20

BP

RESULT 1636 ADJ60937

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Best Local Similarity
                                                                                                                                                     specifically hybridises with the nucleic acid molecule encoding LIM domain kinase 1 and inhibits the expression of LIM domain kinase 1. It specifically hybridises with at least an 8-nucleobase portion of a preferred target region on the nucleic acid molecule encoding LIM domain kinase 1. The antisense oligonucleotide is useful for modulating the expression of LIM domain kinase 1 in cells or tissues to treat diseases associated with their expression, such as a developmental disorder or a neurological disorder. In addition, the compound is used for diagnostics, prophylaxis, or as research reagents or kits. This sequence represents a
                                                                                                                                                                                                                                                                                                                                                          New antisense oligonucleotides for modulating LIM domain kinase 1 expression, useful for diagnosing, preventing or treating conditions associated with the kinase, e.g. neurological or developmental disorders.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     neuroprotective; LIM domain kinase 1; developmental disorder; neurological disorder; diagnostic; prophylaxis; human; ss.
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                                                                                                             Sequence 20 BP; 3 A; 7 C; 5 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                      a nucleic
                                                                                                                                                                                                                                                                                      The invention describes a compound 8-80 nucleobases in length targeted a nucleic acid molecule encoding LIM domain kinase 1. The compound
                                                                                                                                                                                                                                                                                                                                Example 15; SEQ ID NO 83; 81pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2004-121553/12.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        18-JUL-2002; 2002US-00199199
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (ISIS-) ISIS PHARM INC
                                                                                                                                         human LIM domain kinase 1 antisense
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CTGCCTCTCGGGTTCAAG
                          CTGCCTCCCGGGTTCAAG
                                                       Conservative
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are 5-methylcytidines"
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note= "OTHER= 2'-O-Methoxyethyl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    mod_base= OTHER
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                                                                    94.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          "OTHER= 2'-0-Methoxyethyl (2'-MOE) nucleotides"
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                                                                    Score 16.4; DB 1;
Pred. No. 1.6e+03;
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                                                        Mismatches
                                                                                                                                         oligonucleotide.
                                                                                   DB 1;
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                                                                                                                                                                                    Matches
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Best Local :
                                                                                                                                                                                                                                                                                                                                                                                  The present invention relates to an oligonucleotide anti-sense to e.g., initiation codon, coding region with 2-10 nucleotides of 5'-end and 3'-end of nucleic acid target comprising gene(s) chosen from e.g. interleukin (II)-4 receptor, II-5 receptor or salts of the oligonucleotide and optionally surfactant operatively linked to the oligonucleotide and optionally surfactant operatively linked to the oligonucleotide. The method is useful for preventing or treating a respiratory or lung disease, which involves administering to the airways of a subject an effective amount of an inhibitor. The oligonucleotide is
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       airway inflammation; allergy; asthma; impeded respiration; cystic fibrosis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; oligonucleotide;
                                                                                                                                                                                                                                                                                              useful for production of a medicament for the prevention and/or treatment of a respiratory or lung disease. The respiratory or lung disease is chosen from airway inflammation, allergy(ies), asthma, impeded respiration, cystic fibrosis (CF), chronic obstructive pulmonary diseases (COPD), allergic rhinitis (AR), acute respiratory distress syndrome (ARDS), pulmonary hypertension, lung inflammation, bronchitis, airway (ARDS)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codons and introns of respiratory disease-relevant genes e.g., CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Oligonucleotide associated
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                                                         5371/c
ADM15371
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    01-JUL-2004
                                                                                                                                                                                                                                          Sequence
                                                                                                                                                                                                                                                                                     obstruction.
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                              ADM15371;
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                                                           standard;
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in S,
                                                                                                                                TTTTTGAGACAGTGTCT
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                                                                                                                                                                                     Conservative
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    (first entry)
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                                                           DNA;
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                                                                                                                                                                                                                                          2 C;
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                                                                                                                                                                                    Score 16.4; I
Pred. No. 1.6e
0; Mismatches
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                                                                                                                                                                                                                                                                                   represents an oligonucleotide
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                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                                                                                            0 Other;
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antisense oligonucleotides and antisense compounds have cytostatic, antisense oligonucleotides and antisense compounds have cytostatic, antisense oligonucleotides, cardiant, neuroprotective, antiinflammatory, neuroprotective, nootropic, antiarthritic, vasotropic, aphthalmological, immunomodulatory and cardiovascular activities, and can be used as mPGES-1 inhibitors and in gene therapy. The antisense compound can be used for preparing a composition for treating a disease or condition associated with mPGES-1 e.g., inflammation, Alzheimer's disease, arthritis, diabetes, cancer, ischaemia or reperfusion injury, or ophthalmic, immunological, cardiovascular or neurological disorder.

Sequence 20

BP; 4 A;

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4 G;

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0 Other;

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The present sequence represents a chimeric antisense oligonucleotide targeted to human microsomal prostaglandin E2 synthase (mPGES-1). The human mpGES-1 gene is located on chromosome 9, more specifically to 9334.3. The present invention also describes: (1) antisense compounds, having a sequence comprising 8-30 bp targeted to a nucleic acid encoding mpGES-1, which specifically hybridise with the nucleic acid mPGES-1 and inhibits its expression; (2) a method of inhibiting the expression of mPGES-1 in cells or tissues; and (3) a method of treating an animal having a disease or condition associated with mPGES-1. MPGES-1 chimeric and the sequence of t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  immunomodulatory; cardiovascular; gene therapy; inflammation; Alzheimer's disease; arthritis; diabetes; cancer; ischaemia; reperfusion injury; ophthalmic disorder; immunological disorder; cardiovascular disorder; neurological disorder; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New antisense compound, having a sequence targeted to a nucleic avenceding mPGES-1, useful for preparing a composition for treating inflammation, Alzheimer's disease, arthritis, diabetes, cancer or
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/mod_base= OTHER
/mote= "2'-O-methoxyethyls"
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/note= "phosphorothioate linkages
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The invention relates to oligonucleotides anti-sense to an initiation codon, coding region, 5' or 3' intron-exon junction, intron or region with 2-10 nucleotides of the 5'-end or 3'-end of a nucleic acid target chosen from a gene encoding interleukin (IL)-4 receptor, interleukin (IL)-5 receptor, CCR1, CCR3, Ectaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a, tryptase b, PDE4 A, PDE4 B, PDE4 C or PDE4 D. The invention also relates to a method of screening a candidate compound that binds to one or more nucleic acid target(s) or expressed product(s), for the prevention and/or treatment of a respiratory or lung disease. The oligonucleotides are useful for reducing or inhibiting expression of a gene or mRNA encoding interleukin-4 receptor, interleukin-5 receptor, CCR1, CCR3, Ectaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; ss; interleukin-4 receptor; IL-4; interleukin-5 receptor; IL-5; CCR1; CCR3; Ectaxin-1; RANTES; MCP4; CD23; ICAM; VCAM; tryptase a; tryptase b; PDB4 A; PDE4 B; PDB4 C; PDE4 D; respiratory disease; lung disease; hyper-responsiveness; adenosine; adenosine A receptor; asthma; lung allergy; inflammation; inflammatory disease; airway inflammation; allergy; impeded respiration; cystic fibrosis; CP; chronic obstructive pulmonary disease; COPD; allergic rhinitis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; airway obstruction; bronchoconstriction.
                                                                                                                                                                                                                                    Novel single or multiple target oligonucleotide anti-sense to e.g. Conitiation codon, intron of respiratory disease-relevant gene e.g. CORANTES, MCP4, useful for prophylaxis or treating respiratory disease
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23-APR-2002;
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SHAHABUDDIN
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                                                                                                                                                                                                                                                                                                                         Sandrasagra
in S, Lu H,
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2002WO-US013143.
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                                                                                                                                                                                           NO 1793; 174pp; English.
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                                                                                                                                                                                                                                                                                                               A A, Cong
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ong H;
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Pred. No. 1.
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8888888888888
                                                                                                                                                                            tryptase b, PDE4 A, PDE4 B, PDE4 C, or PDE4 D. The oligonucleotides are useful for preventing or treating a respiratory or lung disease. The respiratory or lung disease is associated with hyper-responsiveness to and/or increased levels of, adenosine and/or levels of adenosine A receptor(s), and/or asthma and/or lung allergies associated with inflammation or an inflammatory disease. The respiratory or lung disease is chosen from airway inflammation, allergy, asthma, impeded respiration, cystic fibrosis (CF), chronic obstructive pulmonary disease (COPD),
                                                                                      allergic rhinitis, acute respiratory distress syndrome, pulmonary hypertension, lung inflammation, bronchitis, airway obstruction or bronchoconstriction. This sequence represents an oligonucleotide of the
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Query Match Best Local Sequence 17; Conser 20 ΒP; w ? 1.78; 2 C; 5 G; 10 T; 0 U; Score 16.4; Pred. No. 1 1.6e+03; DB 0 Other; 1; Length

片 Ś 614 \vdash TTTTTTGAGACAGAGTCT TTTTTGAGACAGTGTCT 18 631

Matches

Conservative

0;

Mismatches

1:

Indels

0

Gaps

0

ADP45846 standard; DNA; (first entry) 20

Extend primer 38 used to genotype human ICAM-1/ICAM-4/ICAM-5

RESULT 1639
ADP4584
XX ADP4584
XX ADP4584
XX ADP4584
XX Dreast
XX Dreast
XX Indexce
XW Landste
XW Landste
XW CD54; C
XW Landste
XW CD54; C
XW Landste
XW CD54; C
XW INCOME
XX IN breast cancer; cytostatic; gene therapy; human; intercellular adhesion molecule; ICAM-1; human rhinovirus receptor; BB2; CD54; cell surface glycoprotein P3.58; ICAM-4; Landsteiner-Wiener blood group; ICAM-5; telencephalin; chromosome 19p13; Homo sapiens primer; PCR; SNP; single nucleotide polymorphism; probe

WO2004047623-A2

10-JUN-2004.

25-NOV-2003; 2003WO-US037948.

25-NOV-2002; 24-JUL-2003; 2002US-0429136P. 2003US-0490234P.

(SEQU-) SEQUENOM INC

Roth RB, Nelson MR, Braun Þ Kammerer SM, Reneland æ

2004-441051/41

Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPK10, KIAA0861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample ដា subject.

Example 4; Page 83; 289pp; English

The invention relates to a novel method for identifying a subject at right of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current seminere is that of an extend extend from the course of the course o current sequence is that of an Extend primer of fi

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ADP56753
RESULT 1640
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Best Local S
Matches 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    alpha-methylacyl-CoA racemase; AMACR; fat gene therapy; antisense; 2'-methoxyethyl phosphorothioate backbone; ss; human.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence
                            The invention relates to a novel compound having a sequence comprising 8-80 bp which is targeted to a nucleic acid encoding alpha-methylacyl-CoA racemase (AMACR), specifically hybridises with the nucleic acid encoding alpha-methylacyl-CoA racemase and inhibits the expression of alphamethylacyl-CoA racemase and inhibits the expression of the invention may be useful for preparing a composition for treating a disease or condition involving defects in fatty acid metabolism, possibly via gene therapy. The current sequence is that of a antisense 2'-methoxyethyl (2'-MOE) gapmer oligo of the invention which was targeted to human AMACR RNA.
                                                                                                                                                                                                                 New oligonucleotide compound that inhibits expression of alpha-methylacyl-CoA racemase, useful for preparing a composition for treating a condition involving defects in fatty acid metabolism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           the invention which was used to genotype human intercellular adhesion
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                                                                                                                                                                                                                                                                                                                                                                                10-DEC-2002; 2002US-00316540
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17; Conserv
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                                                                                                                                                                                                                                                                                                                 Jain R;
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                                                                                                                                                                                        SEQ ID NO
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Conservative
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                                                                                                                                                                                                                                                                                                                                                  PHARM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /mod base= OTHER
/not== "OTHER = Bases 1-5 and 16-20 are 2'-methoxyethyl(2'-MOE) bases, all cytidines are 5'-methylcytidines, phosphorothioate backbone throughout"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
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Pred. No. 1.6e+03;
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2'-MOE wing;
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Sequence 20

BP; 4

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6 T;

0 U; 0 Other;

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RESULT 1641
ADP56830/c
ID ADP5683
XX ADP5683
XX ADP5683
XX O9-SEP-
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XX Alpha-n
XX Alpha-n
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RESULT 1642
AAF88161/c
ID AAF8816
XX AC AAF8816
XX AF8816
XX 17-JUL-
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Matches 17
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Best Local S
                                                                                                                                                                                                                                                                                                              Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel compound having a sequence comprising 8 80 bp which is targeted to a nucleic acid encoding alpha-methylacyl-CoA racemase (AMACR), specifically hybridises with the nucleic acid encoding alpha-methylacyl-CoA racemase and inhibits the expression of alphamethylacyl-CoA racemase. The oligonuclectide compound of the invention may be useful for preparing a composition for treating a disease or condition involving defects in fatty acid metabolism, possibly via gene therapy. The current sequence is that of a human AMACR DNA of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New oligonucleotide compound that inhibits expression of alpha-methylacyl-COA racemase, useful for preparing a composition for treating a condition involving defects in fatty acid metabolism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            alpha-methylacyl-CoA racemase; AMACR; fatty acid metabolism;
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  17-JUL-2001
                                                  AAF88161;
                                                                                     161/c
AAF88161 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                        Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                     invention which was targeted for antisense therapy.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (ISIS-) ISIS PHARM INC
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     (first entry)
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Pred. No. 1
                                                                                                                                                                                                                                                                                                                                            Score 16.4;
                                                                                                                                                                                                                                                                                                                 Pred. No. 1.6
D; Mismatches
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RESULT 1643
ABS97400
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local (
        Human; ss; primer; cytochrome P450 A1; CYP4501A1; UGT2B4; MDR1; PCR; cytochrome P450 A2; CYP4501A2; cytochrome P450 O2E; CYP4500ZE1; LTF; adrenergic receptor beta1; ADBR1; aryl hydrocarbon; AHR; MRP3; NR112; aryl hydrocarbon receptor nuclear translocator; ARNT; cathepsin S; CTSS; cyclooxgenase 2; COX2; diazepam binding inhibitor; DBI; haematological; epoxide hydroxylase 2; EPHZ2; S-llpoxygenase activating protein; FLAP; glutathione-S-transferase 12; GST12; histamine-N-methyl transferase; HNMT; kallikrein 2; KLK2; nicotinamide-N-methyl transferase; NNMT; MADPH quinone oxidoreductase 2; NOO2; sulfottransferase thermolabile; STM; UDP-glucuronosyl transferase 2B7; UDP-glucuronosyl transferase 2B7; UDP-glucuronosyl transferase 2B7; UGT2B1; UTOXinase receptor; uPA; multidrug resistance 1; lactotransferin; orphan nuclear receptor; uPA; multidrug resistance 1; lactotransferin; orphan nuclear receptor;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          This invention describes a novel nucleic acid (N1) encoding a polypeptide which comprises a KRAB-domain and/or at least one zinc finger motif. The products of the invention have cytostatic and antithyroid activity and can be used in gene therapy. Nucleic acids, polypeptides, and antibodies of the invention may be used in the diagnosis and/or the therapy of the malfunction of the thyroid and/or hyperlasias of the thyroid and/or thyproid tumors. They may also be used in the production of medicaments. (N1) can also be used to diagnose thyroid tumors which are located on chromosome 19 at band 19q13. This sequence represents a PCR primer used in the isolation of the thyroid malfunction—associated protein, RITA
                                                                                                                                                                                                                                                                                                                                       ABS97400 standard; DNA; 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 8; Page 29; 59pp; German
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  disorders, e.g. tumors
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New nucleic acid useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2001-290723/30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Bullerdiek J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          11-OCT-2000; 2000WO-DE003600.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            cytostatic; antithyroid; gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human thyroid malfunction-associated protein RITA PCR
                                                                                                                                                                                                                                   Human cyclooxygenase 2 (COX2) PCR primer #13.
                                                                                                                                                                                                                                                                        23-DEC-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          12-OCT-1999;
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19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                           CCAGGCTGGAGTGCAG 659
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               described in the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 2 A; 7 C; 4 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            hyperplasia; thyroid; tumor; zinc finger
                                                                                                                                                                                                                                                                    (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0;
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Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        diagnosis and treatment of thyroid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
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1.5e+03;
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Isolated nucleic acid molecules having polymorphisms in known human genes. cytochrome p450 and cathepsin S useful as genetic linkage markers for locating, identifying and characterizing the genes responsible for disorder-related traits.
This invention relates to the sequence of an isolated nucleic acid molecule comprising at least one base variation from that of a known human cytochrome P450 A1 (CYP4501A1), cytochrome P450 A2 (CYP4501A2),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    acetylcholine muscarinic receptor; CHMR1; CHMR2; CHMR3; CHMR4; CHMR5; altered drug metabolism; cardiovascular function; colorectal tumour; central nervous system; pulmonary; immunological.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            28-NOV-2001; 2001WO-US044838.
                                                                                                                                                                         Example 8; Page 112; 714pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2002-698522/75
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CC cytochrome P450 0ZEI (CYPA500ZEI), adrenargic receptor muclear translocator (CRNT), cathepsin S (CTSS), cytochrome P450 0ZEI (CYPA500ZEI), adrenargic receptor muclear translocator (CRNT), cathepsin S (CTSS), cytochrome P450 0ZEI (CYPA500ZEI), diazepam binding CC inhibitor (DBI), epoxide hydroxylase 2 (EPHX2), 5-lipoxygenase activating CC transferase (NMMT), (Kallikrein 2) KLIZ, nicotinamide -N-methyl CC transferase (NMMT), NADEH quinone oxidoreductase 2 (NQO2), ctransferase (IMMT), vanchinase receptor (NR), multidrug resistance associated protein 3 (CRNEA), orphan nuclear receptor (NR112), or acetylcholine muscarrinic creceptor 1, 2, 3, 4, or 5 (CHRR1, CHRR2, CHRR3, CHRR4 or CHRS3) sequence. CC The polymorphisms in the human genes cited in the invention are useful as creative of the years responsible for a variety of disorder-related crare responsible for specific traits within the genome and eventually ctraits as a result of their e.g., overexpression, constitutive traits as a result of their e.g., overexpression, constitutive and/or treating the disorders. The nucleic acid molecules comprising the colymorphic sequences contained in CYP4501A1, CYP44501A2, CRNT, EPHX2, OST312, NNMT, NQO2, NR112, STM, UG72B4, UG72B1, UG72B15, AHR, WNR1 and/or WNR3 are useful for screening individuals for altered drug metabolism. The polymorphic sequences contained in cYP4501A1, CYP44501A2, CRNT, EPHX2, OST312, NNMT, NQO2, NR112, STM, UG72B4, UG72B1, UG72B15, AHR, WNR1 and/or WNR3 may also be used to screen individuals for altered contrail tumours, in DRB1 or CHRR2 are composited by the colorectal tumours, in DRB1 or CHRR2 are contained in cyP4501A1, CYP44501A2, CRNT, EPHX4, OST31C, NNMT, CRNT, CR

Sequence 16 BP; 4 A; N C; 7 G; 3 T; 0 U; 0 Other;

Ś Query Match Best Local S Matches 16 Local Similarity les 16; Conserv GGATTACAGGCGTGAG Conservative 100.0%; 0 Score 16; Pred. No. Mismatches DB 1; 1.5e+03 Length 16; <u>0</u> Gaps

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밁
Human multidrug
                                                                                        ABS98039 standard; DNA; 16
                               23-DEC-2002
                                                                                                                                                                  GGATTACAGGCGTGAG 16
                               (first entry)
 resistance gene
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ВP

PCR primer #3.

w rulman; ws; prime; cycontroume P450 A2; CYCP4501A2; central nervous system; pulmonary; immunological. primer; cytochrome P450 A1; CYP4501A1; UGT2B4; MDR1;

Homo sapiens

WO200257410-A2

28-NOV-2001; 2001WO-US044838

28-NOV-2000; 2000US-00724389

(DNAS-) DNA SCI LAB INC

Guida M, Hall J;

WPI; 2002-698522/75

Isolated nucleic acid molecules having polymorphisms in known human genes e.g. cytochrome p450 and cathepsin S useful as genetic linkage markers for locating, identifying and characterizing the genes responsible for disorder-related traits.

Page 141; 714pp; English

RESULT 1644
ABS98039/c
ID ABS9803
XX Human m
XX Human;
KW Cycochi
KW Cycochi
KW Cycochi
KW Cycochi
KW Cycochi
KW HNNT; N
KW UGT2B7;
KW HNNT; N
KW UGT2B7;
KW HNNT; N
KW UGT2B7;
KW Gentral
XX ABS9803
XX ABS9803 CC This invention relates to the sequence of an isolated nucleic acid CC molecule comprising at least one base variation from that of a known CC human cytochrome P450 A2 (CYP4501A1), cytochrome P450 A2 (CYP4501A2), CC cytochrome P450 A2 (CYP4501A2), CC cytochrome P450 A2 (CYP4501A2), CC aryl hydrocarbon (AHR), aryl hydrocarbon receptor nuclear translocator (ARNY), cathepsin S (CTSS), cyclooxgenase 2 (COX2), diazepam binding CC inhibitor (DBI), epoxide hydroxylase 2 (EPHX2), 5-lipoxygenase activating CC protein (F1AP), glutathione-S-transferase 12 (GST12), histamine-N-methyl CC transferase (NNMT), NADPH quinone oxidoreductase 2 (NQO2), transferase (NNMT), NADPH quinone oxidoreductase 2 (NQO2), CC (MGT2B4), UDP-glucuronosyl transferase 2B4 (UGT2B4), UDP-glucuronosyl transferase 2B4 (CC (MGT2B4), lactotransferrin (LTF), multidrug resistance 1 (CC (MRP3), orphan nuclear receptor (NRI12), or acetylcholine muscarinic CC receptor 1, 2, 3, 4, or 5 (CHMR1, CHMR2, CHMR3, CHMR4 or CHMR5) sequence. CC genetic linkage markers for locating and characterising the genes that are responsible for specific traits within the genome and eventually cidentifying the genes responsible for a variety of disorder-related

> \sim 555555555555555555555555555555 CC expression, mutation or underexpression, which may be used in diagnosing cc and/or treating the disorders. The nucleic acid molecules comprising the polymorphic sequences contained in CYP4501A1, CYP94501A2, CYP4501A2, CYP4501A1, CYP94501A2, CYP4501A2, CYP4501A1, CYP94501A2, CYP4501A2, CYP4501 traits as a result of their e.g., overexpression, constitutive

Sequence 16 BP; 3 A; 7 C; 2 G; 4 T; 0 U; 0 Other;

Query Match Best Local (Matches 16; Similarity Conservative 100.0%; 1.6%; 0, Score 16; Pred. No. Mismatches DB 1; 1.5e+03; Length 16; Indels 0 Gaps 0

밁 S 868 GGATTACAGGCGTGAG 16 GGATTACAGGCGTGAG н 883

RESULT 1645 ACA62885/c ID ACA6288 ACA62885 standard; DNA; 16

ACA62885;

21-AUG-2003 (first entry

Repeated nucleic acid detection method, human probe Alul3.

Repeated nucleic acid detection; human; alu; probe; ss

Homo sapiens

US2003022163-A1

30-JAN-2003.

15-DEC-2000; 2000US-00739909

21-JUL-1999; 25-AUG-1999; 9905-00358972 9905-00383316

(MAND/) MANDREKAR M N. (TERE/) TEREBA A. (SHUL/) SHULTZ J W.

Mandrekar MN, Tereba ۶ Shultz JW;

WPI; 2003-479484/45.

Determining presence or absence of desired nucleic acids that contain multiple repeats of predetermined nucleic acid target sequences in a sample, by using nucleic acid hybridization methods.

Claim 1; Page 27; 31pp; English.

The invention describes a method of determining presence or absence of a desired nucleic acid (NA) that contains multiple repeats of a predetermined NA target sequence in a NA sample. The method involves providing a treated sample that may contain the desired NA in which several predetermined repeating NA target sequences are hybridised with a NA probe, analysing for presence of hybridised NA containing the NA probe, and thereby the presence or absence of the desired NA. The method probe, and thereby the presence or absence of the desired NA.

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RESULT 1646
RCA62878
ID ACA6287
XX ACA6287
XX 21-AUG-
XX Repeate
XX Repeate
XX WS20030
XX JS20030
X
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Matches 16
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desired nucleic acid (NA) that contains multiple repeats of a predetermined NA target sequence in a NA sample. The method involves providing a treated sample that may contain the desired NA in which several predetermined repeating NA target sequences are hybridised with sprobe, analysing for presence of hybridised NA containing the NA probe, analysing for presence or absence of the desired NA. The method is useful for determining the presence or absence of desired nucleic acids that contain multiple repeats of a predetermined NA target sequence, in a NA sample obtained from a biological sample, where the repeated sequence includes several predetermined repeated sequence that differ in length and/or sequence. The methods can be efficiently used for distinguishing human and bacterial NA. The method is highly sensitive,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Repeated nucleic acid detection; human; alu; probe; ss
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                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim 1; Page 27; 31pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Determining presence or absence of desired nucleic acids that contain multiple repeats of predetermined nucleic acid target sequences in a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-479484/45
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mandrekar MN,
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25-AUG-1999;
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                                                                                                                                                                                                                                                                                                                                                                                               The invention describes
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (MAND/) MANDREKAR M N. (TERE/) TEREBA A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (/TUHS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        sapiens
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) SHULTZ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       by using nucleic
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Pred. No.
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1.5e+03;
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RESULT 1647
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        The invention describes a method of determining presence or absence of a CC desired nucleic acid (NA) that contains multiple repeats of a CC desired nucleic acid (NA) that contains multiple repeats of a CC prodding a treated sample that may contain the desired NA in which several predetermined repeating NA target sequences are hybridised with a CC NA probe, analysing for presence of hybridised NA containing the NA CC is useful for determining the presence or absence of the desired NA. The method cis useful for determining the presence or absence of desired NA target CC acids that contain multiple repeats of a predetermined NA target CC sequence, in a NA sample obtained from a biological sample, where the CC distinguishing human and bacterial NA. The method is another that differ in length and/or sequence. The method is highly sensitive, CC and enables detection and quantification of the presence of a NA without the need to undergo a NA target sequence enrichment step prior to a NA contains multiple repeats of a NA target sequence. This desired NA that contains multiple repeats of a NA target sequence. This
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Best Local 9
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SHULTZ
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                                                                                                                                                                                                                                                                                                          27; 31pp; English
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99US-00383316.
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RESULT 1648
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                                                                         desired nucleic acid (NA) that contains multiple repeats of a cc providing a treated sample that may contain the desired NA in which several predetermined repeating NA target sequence in the desired NA in which cC providing a treated sample that may contain the desired NA in which several predetermined repeating NA target sequences are hybridised with a cC NA probe, analysing for presence of hybridised NA containing the NA cC probe, and thereby the presence or absence of the desired NA. The method cC is useful for determining the presence or absence of desired nucleic acids that contain multiple repeats of a predetermined NA target cC sequence, in a NA sample obtained from a biological sample, where the cC repeated sequence includes several predetermined repeated sequence that differ in length and/or sequence. The methods can be efficiently used for distinguishing human and bacterial NA. The method is highly sensitive, can enables detection and quantification of the presence of a NA without the need to undergo, a NA target sequence enrichment step prior to a NA tybrid detection step. The method enables rapid and accurate detection of a desired NA that contains multiple repeats of a NA target sequence. This sequence represents a probe used to detect the human Alu repeat sequences.
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25-AUG-1999;
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SHULTZ J W.
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RESULT 1649
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                                                                                                                                              The invention describes a method of determining presence or absence of a cc desired nucleic acid (NA) that contains multiple repeats of a cc providing a treated sample that may contain the desired NA in which c several predetermined repeating NA target sequences are hybridised with a cc NA probe, analysing for presence of hybridised NA containing the NA cc probe, and thereby the presence or absence of the desired NA. The method cc is useful for determining the presence or absence of desired nucleic caids that contain multiple repeats of a predetermined NA target codistination and Na sample obtained from a biological sample, where the cc sequence, in a NA sample obtained from a biological sample, where the cc distinguishing human and bacterial NA. The method is highly sensitive, and enables detection and quantification of the presence of a NA without the need to undergo a NA target sequence enrichment step prior to a NA contains multiple repeats of a NA target sequence. The method is highly sensitive, the need to undergo a NA target sequence anxious entered the contains multiple repeats of a NA target sequence. This desired NA that contains multiple repeats of a NA target sequence. This
                                                                        Query Match
Best Local
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25-AUG-1999;
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99US-00383316.
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                                                          0;
                                                                           Score 16;
Pred. No.
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                                                                           DB 1; Length 16; 1.5e+03;
                                                              Indels
                                                              <u>,,</u>
                                                              Gaps
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RESULT 1650

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AAD63080/c

ID AAD63080 standard; DNA; 16 BE
XX

AAD63080;

XX

AAD63080;

XX

DT 12-FEB-2004 (first entry)

XX

DT 12-FEB-2004 (first entry)

XX

DT 12-FEB-2004 (first entry)

XX

DE Human tandem tag DNA #14.

XX

XX

Tandem tag; concatenated tag;

XX

OS Homo sapiens.

XX

D9-OCT-2003.

XX

O6-MAR-2002; 2002US-00092885.

XX

XX

OF MARA-2002; 2002US-00092885.

XX

OF MARA-2002; 2002US-00092885.

XX

OF MARA-2002; 2002US-00092885.

XX

OS-MAR-2002; 2002US-0092885.

XX

OS-MAR-2002; 2002US-0092885.

XX

OS-MAR-2002; 2002US-0092885.

XX

OS-MAR-2002; 2002US-0092885.

XX

OS-MAR-2002; 2
RESULT 1651
AAD63081/c
ID AAD6308
XX AAD6308
AC AAD6308
XX AAD6308
CT 12-FEB-
XX Human t
XX Tandem
XX Tandem
XX US20031
XX US20031
XX PD 09-OCT-
XX
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Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Generating five prime biased tandem tag libraries of cDNAs by isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags.
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                                                                                                                                                                                                                                               Human tandem tag
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                                                                                                                                                                                       tag;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       CGGCCTCCCAAAGTGC 265
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                                                                                                                                                                                             concatenated
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                                                                                                                                                                                                                                               DNA #15
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100.0%; Pred. No. 1.5e+03;
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                                                                                                                                                                                             human;
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RESULT 1652
AAD63078/c
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Best Local Sim
Matches 16;
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                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 16 BP; 3 A; 6 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention discloses a method for generating five prime biased tandem tag libraries of cDNAs. The step involves isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Samal B,
                                                                                                                                                                                 US2003190618-A1
                                                                                                                                                                                                    Homo sapiens.
                                                                                                                                                                                                                    Tandem tag; concatenated tag;
                                                                                                                                                                                                                                    Human tandem tag DNA #12.
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                                                                                                                                                                                                                                                                                           AAD63078
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 5; Opp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        concatenated tags.
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                                                      Samal
                                                                                                                                              06-MAR-2002; 2002US-00092885
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                                   WPI; 2003-831617/77.
                                                                                         HERM/
                                                                                                           (SAMA/)
                                                                                                                                                                                                                                                                                                                                                                                    Local Similarity
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JOHE K K.
                                                                     LI Y.
HERMIDA L C.
HOPPA N L.
JOHE K K.
                                                                                                          SAMAL B.
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                                                                                                                                                                                                                                                                                                                                          GATTACAGGCGTGAGC
                                                                                                                                                                                                                                                                                            standard;
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                                                     Li Y,
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                                                     Hermida LC,
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Pred. No.
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Generating five prime biased tandem tag libraries of cDNAs by isolating sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the

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RESULT 1653
AAD63084/c
ID AAD6308
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Matches 16
Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 concatenated
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
                                                               The present invention discloses a method for generating five prime biased trandem tag libraries of cDNAs. The step involves isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags. The present sequence is human tandem tag DNA
                                                                                                                                                       Generating five prime biased tandem tag libraries of cDNAs by isolating sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags.
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                                                                                                                                    Disclosure;
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                                           Sequence 16
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                                                                                                                                                                                                                                                                                                        SAMAL
            Similarity
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                                                                                                                                                                                                                                     Li Y,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Page
                                           BP; 3 A; 3 C; 6 G; 4 T; 0 U; 0 Other;
                                                                                                                                   Page
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 Conservative
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                                                                                                                                    5; Opp; English.
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Pred. No.
            Score 16;
Pred. No.
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                       DB 1;
              1.5e+03
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AGCCTCCCAAAGTGCT 396

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RESULT 1654
AAD63086/c
ID AAD6308
AAA22740
ID AAA2
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AC AAAA2
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XX Inte
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Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAD63086 standard;
                                                                                                                                                                                                                                                                  The present invention discloses a method for generating five prime biased tandem tag libraries of cDNAs. The step involves isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags. The present sequence is human tandem tag DNA
                                                                                                                                                                                                                                                                                                                                                                                                              WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                    Samal
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Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic;
                                                                                                       AAA22740 standard; RNA;
                                                                                                                                                                                                                                                 Sequence 16
                                                                                                                                                                                                                                                                                                                                    Disclosure; Page
                                                                                                                                                                                                                                                                                                                                                          concatenated
                                         Integrin subunit beta 3 substrate sequence
                                                                19-JUN-2000
                                                                                   AAA22740;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        (JOHE/)
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                                                                                                                                                                                                                 Local
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) HERMIDA L C
) HOPPA N L.
) JOHE K K.
                                                                                                                                                                                                     l Similarity
16; Conserv
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LI Y.
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Pred. No.
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RESULT 1656
AAA22748
ID AAA2274
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AC AAA2274
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AC AAA2274
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DT 19-JUN-
XX
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Best Local Similarity
Thes 6; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CC cleaving activity, which specifically cleave RNA encoded by an aryl clave and integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to RAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for AAA17167 and AAA17561 to AAA17623 to AAA17684 represent their CC corresponding target sequences. AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 to AAA19022 represent their corresponding target sequences; CC AAA191254 represent alpha 6 subunit, and AAA20362 to AAA19086 and AAA19223 to AAA20361 and AAA21501 to AAA20362 to AAA21500 and CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA22475 and AAA23363 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA23476 to AAA22362, AAA23343 to CAA23422 represent their corresponding target sequences for integrin subunit beta 3, and AAA23476 to AAA22362, AAA23343 to CAA23422 represent their corresponding target sequences of the invention are used for modulating the synthesis, expression and/or CC the invention are used for modulating target sequences. The ribozymes of constability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related consolvance of the corresponding target sequences. The corresponding target sequences for angiotibroma of tubercous sclerosis, pot-wine stains, Sturge Weber corresponding target sequences and other syndrome, and disease related to the levels of ARNT, Tie-2, integrin subunit hera-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
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                                   19-JUN-2000
                                                                                                       AAA22748;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17 BP; 3 A; 1 C; 3 G; 0 T; 10 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 54; Page 239; 305pp; English.
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                                                                                                                                                                       AAA22748 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention describes enzymatic nucleic acid molecules with RNA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                               1065 GCTAATTTTTGTATTT 1080
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                                   (first entry)
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                                                                                                                                                                       RNA; 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   10;
                                                                                                                                                                       ВP
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Pred. No.
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Cc cleaving activity, which specifically cleave RNA encoded by an aryl comparison nuclear transporter (ARNT) gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17621 to AAA17622 represent ribozyme sequences for AAA1764 and AAA17651 to AAA17622 represent ribozyme sequences for Tie-2, and AAA19087 to Cc and AAA1768 to AAA17650 and AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences; AAA17685 to AAA18385 to AAA19086 cc AAA19223 to AAA20361 and AAA21501 to AAA21885 to AAA18385 to AAA19086 cc AAA19223 to AAA20361 and AAA21501 to AAA21855 to AAA21800 and AAA19223 to AAA21868 represent their corresponding target sequences; CC AAA21899 to AAA21868 represent their corresponding target sequences; CC AAA21899 to AAA21475 and AAA22363 to AAA21897 ta AAA21800 and AAA21809 to AAA21475 and AAA22363 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA23343 to AAA23422 represent their corresponding target sequences; CC AAA21422 represent their corresponding target sequences; CC AAA21422 represent their corresponding target sequences of critegrin subunit beta 3, and AAA22476 to AAA23362, AAA23343 to CC integrin subunit beta 3, integrin subunit atrget sequences. The ribozymes of critegrin subunit beta 3, integrin subunit alpha-6, or Tie-2. They are cespecially AAA24476 to AAA2362, AAA23343 and AAA24476 to AAA236262, AAA2344 as a color of the sequences. The ribozymes of critegrin subunit beta 3, integrin subunit alpha-6, or Tie-2. They are cespecially AAA4404 as well as a sequence of tuberous sclerous, diabetic retinopathy, age related concer, color of tuberous sclerous, specially AAA4404 as well as a sequence, and arthritis, as well as a sequence, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and a thritis as a sequence, and a thritis as a sequence.
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tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human; aryl hydrocarbon nuclear transport;
integrin alpha 6 subunit; integrin subunit
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The present invention describes enzymatic nucleic acid molecules with cleaving activity, which specifically cleave RNA encoded by an aryl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Novel
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ribozymes for modulating the synthesis, expression and/or stability mRNA encoding an angiogenic factors.
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RESULT 1657
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ID AAA2273
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AAA22736 standard; RNA; 17
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Sequence

17 BP;

5 A; 1 C; 4 G; 0 T; 7 U; 0 Other;

문 S

AAA22736;

19-JUN-2000

(first entry)

Integrin subunit beta 3 substrate sequence

hydrocarbon nuclear transport;

ARNT; TIE-2; angiogenesis; beta 3; hairpin ribozyme;

SEQ ID NO:5962.

integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic, ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.

ARMD;

07-OCT-1999

Homo sapiens

WO9950403-A2

1

175

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CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a fire-2 gene. AAA1775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17561 to AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17683 to AAA17684 represent their CC cand AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC and AAA19155 to AAA19222 represent their corresponding target sequences; CC aAA19233 to AAA21681 and AAA21591 to AAA21595 represent ribozyme cc sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA22475 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA23476 to AAA23262, AAA23343 to CC C the invention are used for modulating target sequences. The ribozyme of CC the invention are used for modulating the synthesis, expression and/or CC stability of an mRNA encoding anglogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are cespecially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, cangiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber CC angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber
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                                 Query Match
Best Local S
Matches 13
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             24-MAR-1999;
                                                                                                                                                    syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
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                                                                                                                                      subunit beta-3
                                                                    DB 1;
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                                        Indels
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl C hydrocarbon nuclear transporter (ARNY) gene, an integrin subunit beta 3 cg gene, an integrin subunit deta 3 cg gene, an integrin subunit deta 3 cc gene, an integrin subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17168 to AAA17561 to AAA17622 represent ribozyme sequences for ARNY, CC and AAA17168 to AAA17560 and AAA17685 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19086 to AAA19154 represent ribozyme sequences for Tie-2, and AAA19386 to AAA19086 cc AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA21922 represent their corresponding target sequences; CC AAA19223 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21599 to AAA22475 and AAA21501 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA23343 to CC AAA23422 represent their corresponding target sequences of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNY.

CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related concersion of tuberous sclerosis, pot-wine stains, sturge Weber negotion and functions. Weber wondrome. Winnel-Transmay-Weber wondrome. Sturge Weber and concers.
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tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; 88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozy
hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic;
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subunit

syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,

or integrin

beta-3

Query Match Best Local

Similarity

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                                                                                         The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a rie-2 gene AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17563 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18985 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA18986 to AAA19086 CC and AAA19155 to AAA12222 represent their corresponding target sequences; CC AAA19223 to AAA20361 and AAA21501 to AAA21502 represent ribozyme CC AAA19223 to AAA20361 and AAA21501 to AAA21503 represent ribozyme sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA22475 and AAA22561 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362, AAA23343 to CC ana32422 represent their corresponding target sequences. The ribozymes of CC the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, CC especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as consisting the synthesis, verruca vulgaris, CC angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber CR ending syndrome. Weber Tending syndrome.
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syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
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The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl chydrocarbon nuclear transporter (ARNT) gene, an integrin submit beta 3 cc gene, an integrin alpha 6 submit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, c and AAA17168 to AAA17563 and AAA17623 to AAA1684 represent their c corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 c and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19154 represent their corresponding target sequences; CC AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme and c sequences for integrin alpha 6 submit, and AAA21352 to AAA21800 and CC AAA21896 to AAA22475 and AAA23363 to AAA23342 represent ribozyme sequences; CC AAA21896 to AAA22475 and AAA23363 to AAA23342 represent ribozyme sequence for integrin submit beta 3, and AAA23476 to AAA23362, AAA23343 to AAA23422 represent their corresponding target sequences of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, c integrin submit beta-3, integrin submit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related c macular degeneration (ARND), inflammation, and arthritis, as well as
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nes 4; Conservative
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Pred. No. 1.5e+03;
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RESULT 1661
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                                                                                                                                                                                                                                     The present invention relates to detecting a genetic predisposition in a human subject for non-responsiveness to statin drug treatment, involving amplifying nucleic acids including a non-coding or untranslated region within the 3' end of the human lipoprotein lipsae (LPL) gene from a tissue sample. The method is useful for determining which patients suffering from coronary artery disease, or which coronary artery bypass graft (CABG) patients, will likely not respond positively to statin drug treatment with respect to stenosis of a coronary artery or bypass graft
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          angiofibroma of tuberous sclerosis, syndrome, Kippel-Trenaunay-Weber syn
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ilarity 100.0%;
Conservative
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larity 100.0%;
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                                                                                                       The invention relates to a novel process for a manufacturer to obtain customer orders for custom-designed biochips in an automated process. invention also includes an automated system and process for providing fully automated process for the design, manufacture and analysis of defor biological array devices. The sequence represents a capture probe designed in the invention for the "sample ataxia" set of targets, as a example of an array that may be designed using the method of the
                                                                                                                                                                                                                                    Automated process for custom-designed biochip design, comprises obtaining desired target sequences from customer, creating sequence content motif for an array and applying the motif to a surface suitable for later
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABN83022;
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                                                                    Sequence 17
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                                                                                                                                                                                                                                                                                                          Anderson BP,
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22-NOV-2000;
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                                    Similarity
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2000US-0252880P
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밁 17 CACTGCAACCTCTGCC N Gaps

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RESULT 1663 ABT38108 12-JUN-2003 ABT38108 standard; DNA; (first entry) 17 ВP

Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; Tumour suppression related human fukutin oligo SEQ ID No 3745.

numan fukutin; protein chip; gene ds.

Homo sapiens

WO2003025175-A2

RESULT 1662

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IID ABF17
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AC ABF17
AXX Tume
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XXX Tume
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KW Cyte
KW Schin
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive cc nucleotides from the 17 mer sequence, a sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence, a sequence that comprise to them under highly stringent conditions, or the complement cc acids of the invention are useful as probes and primers for detecting, cc identifying, quantifying and/or amplifying a nucleic acid, e.g. as one cc component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, cc polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral cd diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and comparation of the sueful for diseases. The polypeptides can also be used to generate antibodies, and chips. The nucleic acid sequences of the invention can be used in gene characterine sequences of the invention can be used in gene characterine sequences of the invention can be used in gene characterine sequences of the invention can be used in gene characterine sequences of the invention can be used in gene characterine sequences of the invention can be used in gene characterine sequence of the invention can be used in gene characterine sequence of the invention can be used in gene characterine contains and/or prognosis of these can be used in gene characterine contains and/or prognosis of these can be used in gene characterine contains and/or prognosis of these can be used in gene characterine contains and/or prognosis of these can be used in gene characterine can be used in gene can
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              17-SEP-2002; 2002WO-IB004208
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                                                                                                                                               Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                                                                                                                                                                                                                                                                                                                      ABT35067;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Page 471; 720pp; French
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                                                                                                                                                                                                                                                                      Tumour suppression related human fukutin oligo SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                      ABT35067 standard; DNA; 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       BP; 2
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                                                                                                                                                                                                                                                                                                                      (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              100.0%;
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100.0%; Pred. No. 1.5e+03;
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27-MAR-2003.

30-JUL-2002; 2002EP-00016874.

05-FEB-2003

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ADB04313
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Best Local Similarity
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                                                                                                                                                                               Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1, chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; developmental disorder; ss.
                                                                                                                                                                                                                                                                                                Human MDZ7 scanning oligonucleotide SEQ ID 5299
                                                                                                                                                                                                                                                                                                                                                                                                                                         ADB04313 standard; DNA; 17
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Pred. No. 1.5e+03;
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RESULT 1666
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AC ADB0444
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DT 20-NOV-
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Cytosta
KW Zinc fil
KW Zinc
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; developmental disorder; ss.
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         WPI; 2003-423107/40
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                                                                Shannon M,
                                                                                                                                                                                                                                         30-JUL-2002; 2002EP-00016874.
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                                                                Gu Y,
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Pred. No.
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hes 0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 chromosome 15q26.1; cancer;
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The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fg26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ7, or MDZ12 genetic locus. The probes are alterations in MDZ3, MDZ7, or MDZ12 genetic locus. The probes are
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        or MDZ12, e.g. cancer.
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Query Match Best Local S Matches 16 Sequence 17 BP; 16; Similarity Conservative 5 A; 1 C; 4 G; 7 T; 0 U; 0 Other; 1.6%; 0; Score 16; Pred. No. Mismatches DB 1; Lo Length 17; Indels ٥, Gaps 0

useful in constructing microarrays for measuring gene expression. proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention

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RESULT 1667
ADB04438
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ADB04438 standard; DNA; 17
                                                              774 GTATTTTTAGTAGAGA 789
                                                 GTATTTTTAGTAGAGA
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Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer; developmental disorder; ss. Homo Human MDZ7 scanning oligonucleotide SEQ ID 20-NOV-2003 sapiens. (first entry) 5424.

EP1281758-A2

05-FEB-2003.

30-JUL-2002; 2002EP-00016874.

02-AUG-2001; 2001US-00922181

AEOMICA INC

3 ű Ķ Nguyen C;

2003-423107/40

New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer. MDZ3

Example 8; SEQ ID NO 5424; 103pp; English

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ADB04281
XX ADB
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Best Local S
Matches 16
The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6g21.3-22.2, MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic
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zinc finger
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                                                                                                                                                                                                                                                                                                                                                SEQ
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                                                                                                                                                                                                                                                                                                                                            ID NO 5267; 103pp; English
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100.0%; Pred. No.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          zinc finger protein; MDZ3; MDZ4; MDZ7; chromosome 6p21.3-22.2; chromosome 16p: developmental disorder; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 8; SEQ ID NO 5301; 103pp; English
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Pred. No.
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proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 1pp1.2 and MDZ12 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 15g26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are

The present invention relates to novel human zinc finger-containing

useful in constructing microarrays for measuring gene expression. proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the immentations.

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                             S
                                                                                                                                                                                                                                          The present invention relates to novel human zinc finger-containing compositions and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is concided at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, CC MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome composition of manufacturing a medicament for treating or preventing a disorder composition of manufacturing a medicament for treating or preventing a disorder composited with decreased or increased expression or activity of MDZ3, CC MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic cacids and proteins are also useful for diagnosing or monitoring a disease composition of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic cacids can also be used as probes to detect and characterize gross are cuseful in constructing microarrays for measuring gene expression. The constructing microarrays for measuring gene expression. The coroteins are useful as therapeutic agents for gene therapy or as the probes are sequence was used to illustrate the invention.
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Best Local :
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                                                                                                                                                                                                    Sequence
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TTTTGAGACAGAGTCT
                                                                                                                                                                                                    17 BP; 4 A; 2 C; 5 G; 6 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gu Y, Nguyen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
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                                                                                       Conservative
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                                                                                                               1.6%;
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                                   631
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Pred. No.
                                                                                                                  Score 16;
Pred. No.
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                                                                                                                                               DB 1;
                                                                                                                     1.5e+03;
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RESULT 1671
ABZ60605
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UXXXXXX
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ACC63031/c
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Best Local
                                                                                                                                                                                                                                                                                              The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66555 represent substrate/target sequences for the human riborators.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        21-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 anti-rheumatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human K-Ras DNAzyme substrate #717.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ABZ60605;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABZ60605 standard; RNA; 17
                                                                     ACC63031 standard; DNA; 17
                                                                                                                                                                                                                                                        Sequence 17 BP; 3 A; 6 C; 5 G; 0 T; 3 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 58; Page 98; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2003-140484/13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mcswiggen J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              29-MAY-2002; 2002WO-US016840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO200297114-A2
               01-JUL-2003
                                        ACC63031;
                                                                                                                                                                                                                                                                                     ribozymes of
                                                                                                                                                        207 CAGGCTGGTCTCGAAC 222
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                                                                                                                                                                                                  13;
                                                                                                                                          N
                                                                                                                                                                                                              Similarity
                                                                                                                                          CAGGCUGGUCUCGAAC 17
                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                        the invention
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               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  cancer; AIDS; ss.
                                                                                                                                                                                                               1.6%;
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                                                                                                                                                                                                                 Score 16; DB 1;
Pred. No. 1.5e+03;
                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                     0;
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ADB44260/c
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in virro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 17 BP; 5 A; 8 C; 2 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mus musculus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; murine; tumour suppression; tumour reversion; apoptosis; virus resistance; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Murine oligonucleotide associated with tumour supression,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; Page 63; 738pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         17-SEP-2001; 2001FR-00011979
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             schizophrenia; ss.
17-SEP-2002; 2002WO-IB004219.
                                                         WO2003040369-A2
                                                                                                                                             cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss;
primer; probe; tumour suppression; tumour reversion; apoptosis;
                                                                                                                                                                                                                         18-DEC-2003
                            15-MAY-2003
                                                                                     Homo sapiens.
                                                                                                                                                                                         Tumour suppression/reversion associated nucleotide #4583
                                                                                                                                                                                                                                                      ADB44260
                                                                                                                                                                                                                                                                                   ADB44260 standard;
                                                                                                                               virus resistance; transgenic animals; Alzheimer's
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   2003-333167/31.
                                                                                                                                                                                                                                                                                                                                                                             480 GTGCAGTGGTGATC 495
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                                                                                                                                                                                                                                                                                                                                                            GTGCAGTGGTGATC 1
                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
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                                                                                                                                                                                                                        (first entry)
                                                                                                                                                                                                                                                                                   DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                  100.0%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Tuijnder M;
                                                                                                                                                                                                                                                                                   ВP
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                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 16;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                      0
                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
                                                                                                                                 disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      SEQ
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suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                    fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under the first optimal alignment.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                                                                            nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Telerman
Sequence 17 BP; 5 A; 7 C; 3 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; Page 567; 771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-441574/41.
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Query Match
Best Local Similarity
Matches 16; Conserv Conservative 100.0%; 1.6%; 0 Score 16; Pred. No. Mismatches DB 1; 1.5e+03; Length 17; Indels 0,

Gaps

<u>,</u>

can

뮹 RESULT 1674 ACC54382 ACC54382 standard; 480 GTGCAGTGGTGTGATC 495 16 GTGCAGTGGTGTGATC DNA; 17

S

Human tumour suppressor sequence #3149. (first entry)

27-JUN-2003 ACC54382;

tumour regression; apoptosis; virus resistance; ss; tumour suppressor; antitumour; cytostatic; tumour suppression; diagnosis;

cellular degeneration.

FR2826373-A1 Homo sapiens

27-DEC-2002.

20-JUN-2001; 2001FR-00008139

20-JUN-2001; 2001FR-00008139

(MOLE-) MOLECULAR ENGINES LAB SA

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RESULT 1675
ACC51495/c
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             New nucleic acid sequences associated with tumor suppression, regres apoptosis or virus resistance are useful to diagnose and treat viral disease, development of tumor cells and cell degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 This sequence represents an isolated nucleic acid sequence associated with tumour suppression or regression, apoptosis or virus resistance. invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Tuijnder M,
                                                                                                                                                   New nucleic acid sequences associated with tumor suppression, rapoptosis or virus resistance are useful to diagnose and treat disease, development of tumor cells and cell degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                 tumour regression; appearation
                                                                                                                                                                                                                                                                                                                                                                                                                                             ss; tumour suppressor; antitumour; cytostatic; tumour suppression; tumour regression; apoptosis; virus resistance; diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17
        invention relates to these sequences or sequences having at least a identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration.
                                                                                                                                                                                                                                                                                          20-JUN-2001; 2001FR-00008139
                                                                                                                                                                                                                                                                                                                      20-JUN-2001; 2001FR-00008139
                                                                                                                                                                                                                                                                                                                                                   27-DEC-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human tumour suppressor
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                                                                                                                        Claim 1;
                                                                                                                                                                                                                                                                (MOLE-) MOLECULAR ENGINES LAB
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                                                                                 tumour suppression or regression,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                N
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ATCTTGGCTCACTGCA 682
                                                                                                                        Page
                                                                                                                                                 development of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 3 A;
                                                                                                                                                                                                                                    Telerman
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       by development of tumour cells or cellular degeneration
                                                                                                                        100; 798pp; French
                                                                                              represents
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 100.0%;
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ADL50194
                        that down regulate the expression or inhibit the function of a receptor (or a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), (in lappas kinase (IKK), or protein kinase PKR. The nucleic acids of the cinvention are useful for treating: cerebrovascular accident, central cerevous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, cerestenosis or asthma), Crohn's disease (e.g. rheumatoid arthritis, cestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune ci scheame; lupus, multiple sclerosis, transplant/graft rejection, ce conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the cexpression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis; restencesis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; graft rejection; ischaemia; reperfusion; glomerulonephritis; human PKR;
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                                                                                                                                                                                                                                                                                                                           Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                      The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), KappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rhematoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, cischaemia/reperfusion injury, slomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR substrate sequence.
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29-MAY-2001; 2001US-0294412P
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RESULT 1678
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                        The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (PTGR) (C for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGR), C (RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the C invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, C lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune C disease, lupus, multiple sclerosis, transplant/graft rejection, C conditions (e.g. asthma, allergic rhinitis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis, sepsis, and allergic nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR c substrate sequence.
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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Pred. No. 1.5e+0
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RESULT 1679
                                     The invention comprises nucleic acids (e.g. antisense oligonucleotides) Ct that down regulate the expression or inhibit the function of a receptor (for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the cinvention are useful for treating: cerebrovascular accident, central convention are useful for treating: cerebrovascular accident, central convention are useful for treating: cerebrovascular accident, central convention are useful for treating: cerebrovascular accident, central conventions or glioma), inflammatory disease (e.g. rheumatoid arthritis, crestenosis or asthma), Crohn's disease (e.g. rheumatoid arthritis, conventions or asthma), Crohn's disease, diabetes, obesity, autoimmune conditions (e.g. asthma, Crohn's disease, diabetes, obesity, autoimmune conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The conclusic acids of the invention are also useful for down-regulating the cultific acids of the invention are also useful for down-regulating the conclusic acids of the invention are also useful for down-regulating the conclusic acids of the invention are also useful for down-regulating the conclusic acids of the invention are also useful for down-regulating the conclusic acids of the invention are also useful for down-regulating the conclusions within diseased cells or to detect the presence of a carget RNA in a cell. The present RNA sequence represents a human PKR conclusions within diseased cells or to detect the presence of a carget RNA in a cell. The present RNA sequence represents a human PKR carget RNA in a cell.
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29-MAY-2001; 2001US-0294412P
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Pred. No. 1.
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29-MAY-2001;
28-AUG-2001;
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                                that down regulate the expression or inhibit the function of a receptor for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR). IMAGE (RIK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, eischaemia/reperfusion injury, glomerulonephritis sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                antisense oligonucleotide; neurite growth inhibitor; NOGO. prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
                                                                                                                                                                                                                                                                                                                                                                                  Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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                                                                                                                                                                                                                                                                                                                                              Claim 59; SEQ ID NO 3748; 317pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               03-APR-2002; 2002WO-US010512
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (RIBO-) RIBOZYME PHARM INC.
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                                                                                                                                                                                                                                                                        invention comprises nucleic acids (e.g. antisense oligonucleotides) t down regulate the expression or inhibit the function of a receptor ( down regulate the expression or inhibit the function of a receptor ( PTGDR ) a neurite growth inhibitor, NOGO, prostaglandin D2 receptor ( PTGDR )
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      843 CCTGCCTCGGCCTCCC 858
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Chowrira B,
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; 2001US-0294412P.
; 2001US-0315315P.
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                             The invention comprises nucleic acids (e.g. antisense oligonucleotides)
that down regulate the expression or inhibit the function of a receptor
for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
C IkappaB kinase (IKK), or protein kinase PRR. The nucleic acids of the
invention are useful for treating: cerebrovascular accident, central
nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
Lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,
restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
disease, lupus, multiple sclerosis, transplant/graft rejection,
c chaese, lupus, multiple sclerosis, transplant/graft rejection,
c disease, lupus, multiple sclerosis, transplant for down-regulating the
mucleic acids of the invention are also useful for down-regulating the
c expression of a target gene and as a diagnostic tool to examine genetic
drifts and mutations within diseased cells or to detect the presence of a
target RNA in a cell. The present RNA sequence represents a human PKR
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                                                                                                                                                                                                                                                                                                                                                                                                                               Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                                                                                                                                                                                                                                                                                                              protein kinase PKR genes, for treating cancer and inflammatory disease
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                                                                                                                                                                                                                                                                                                                                                                       SEQ ID NO 3447; 317pp; English.
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Pred. No. 1.5e+03;
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RESULT 1682
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                        The invention comprises nucleic acids (e.g. antisense oligonucleotides)
CC that down regulate the expression or inhibit the function of a receptor
CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
CC RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
CC invention are useful for treating: cerebrovascular accident, central
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC ymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,
CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
CC disease, lugus, multiple sclerosis, transplant/graft rejection,
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC cultic acids of the invention are also useful for down-regulating the
CC drifts and mutations within diseased cells or to detect the presence of a
CC culted transplant or a cell. The present RNA sequence represents a human PKR
CC substrace accompany
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Best Local :
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29-MAY-2001;
28-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                             Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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                                                                                                                                                                                                                                                                                                                             Claim 59; SEQ ID NO 3442; 317pp; English.
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2001US-0294412P.
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Pred. No. 1.5e+0;
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                                 The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC (RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC (IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC (IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC (IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC (IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the injury, spinal cord injury, cancer (e.g. melanoma, CC (Iyaphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC (Iyaphoma or glioma), inflammatory disease, diabetes, obesity, autoimmune CC (Iyaphoma or glioma), Crohn's disease, diabetes, obesity, autoimmune CC (Isabete, lugus, multiple sclerosis, transplant/graft rejection.

CC (Isabete, lugus, multiple sclerosis, transplant) for down-regulating the cclerosis and multiple sclerosis.

CC (Isabete, lugus, multiple sclerosis, lugus, m
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Best Loc
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis; restencesis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 59; SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                            protein kinase PKR genes,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2003-058513/05
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase o
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                                                                                                                                                                                                                                                                                                                                                                                                                   ID NO 3465; 317pp; English.
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Pred. No.
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                                                        that down regulate the expression or inhibit the function of a receptor (PTGDR), rec
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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landin D2 receptor; PTGDR; IkappaB kinase; IKK;
kinase PKR; cerebrovascular accident;
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                      The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CI kappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the cinvention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, 1 lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obseity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR gubstrate sequence.
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29-MAY-2001; 2001US-0294412P
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                                 that down regulate the expression or inhibit the function of a receptor of or a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), in the function are useful for treating; cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, cischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor that down regulate the expression or inhibit the function of a receptor (PTGDR),
                                                                                                                                                                                                                                                                                                                                        Claim 59; SEQ ID NO 3960; 317pp; English.
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                                                              The invention comprises nucleic acids (e.g. antisense oligonucleotides)
that down regulate the expression or inhibit the function of a receptor
for a neurite growth inhibitor, NGO, prostaglandin Dz receptor (PTGDR),
KappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
invention are useful for treating: cerebrovascular accident, central
convention are useful for treating.
central
convention are useful for disease (e.g. melanoma,
convention are of disease, chapter, autoimmune
conventions or asthma), Crohn's disease, diabetes, obesity, autoimmune
conventions (e.g. asthma), Crohn's disease, chapter rejection,
conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
convention of a target gene and as a diagnostic tool to examine genetic
conditions of a target gene and as a diagnostic tool to examine genetic
convention of a target gene and as a diagnostic tool to examine genetic
convention are also useful for down-regulating the
convention of a target gene and as a diagnostic tool to examine genetic
convention are also useful for down-regulating the
convention are
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKX; protein kinase pKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis; restencesis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human pKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase oprotein kinase PKR genes, for treating cancer and inflammatory disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2003-058513/05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Blatt L,
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                                           substrate :
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ilarity 75.0%;
Conservative
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Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0
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. 1.5e+03;
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                                                                                 The invention relates to a novel method for identifying a subject at ri of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current sequence is that of an Extend primer (also described as probe) the invention which was used to genotype human kho family guanine-nucleotide exchange factor KIAAO861 gDNA which has been mapped to
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                                                                                                                                                                                                                                                                                                                                                             Roth
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                                                                                                                                                                                                                                                                               Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPK10, KIAA0861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample
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24-JUL-2003; 2003US-0490234P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         nucleotide polymorphism;
mily guanine-nucleotide exchange factor; KIAA0861;
some 3q27.3; probe.
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16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cancer; cytostatic; gene therapy; human;
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                                                                                                                                                                                                                                           6; Page 99;
             Similarity
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Matches 16
                 Oligonucleotide RT27 used
                                                                                                                                                                                                                                                                                                                 The present oligonucleotide reduces T cell CD28 gene expression, useful in the treatment of CD28 mediated diseases, particularly immune system disorders, e.g. graft versus host disease, septic shock, viral disease, psoriasis, type I diabetes mellitus, thyroiditis, sarcoides, multiple sclerosis, uveitis, rheumatoid arthritis, systemic lupus erythematosus, inflammatory bowel disease, etc. . Reducing CD28 expression may reduce effects of antigenic stimulation of CD28 positive T cells, with a consequent reduction in cytokine release. (Updated on 25-MAR-2003 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  vilgo:nucleotide which reduces CD28 gene expression in T cells - for treating immune system diseases, e.g. graft vs. host disease, septic shock, psoriasis, etc.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Reduction; T cell; CD28; gene expression; treatment; immune system; disorder; graft versus host disease; septic shock; viral disease; psoriasis; type I diabetes mellitus; thyroiditis; sarcoides; multiple sclerosis; uveitis; rheumatoid arthritis; 5'-UTR; systemic lupus erythematosus; inflammatory bowel disease; antisense oligonucleotide; 5'-untranslated region; ss.
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16-APR-1997
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAT36226 standard; DNA;
                                                                                                                                                                                                                                                                              Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              09-FEB-1995;
18-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       05-FEB-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO9624380-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Antisense
                                                                                                 AAX90320 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 1; Page 27; 77pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 1996-384228/38.
                                            24-SEP-1999
                                                                                                                                                                                                                                                                                                         consequent
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (ICNC ) ICN PHARM INC.
                                                                                                                                                                                               872 TACAGGCGTGAGCCAC 887
                                                                                                                                                                    18
                                                                                                                                                                                                                         l Similarity
16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            oligo targetting
                                                                                                                                                                                                                                                                                                          field.)
                                                                                                                                                                                                                                                                              BP; 3 A; 6 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                          Conservative
                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              95US-00387041.
95US-00529878.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       96WO-US001507.
                                                                                                                                                                                                                                      100.0%;
                                                                                                                                                                                                                                                     1.6%;
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                 ä
                                                                                                 BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               CD28
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                                                                                                                                                                                                                                      Score 16;
Pred. No.
                 an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            inflammatory bowel disease; antisense;
               Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              5'-UTR (nt -201 to -184).
                                                                                                                                                                                                                                    DB 1; Le
1.6e+03;
                 from
                 US5932556.
                                                                                                                                                                                                                                                  Length 18;
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Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      treating immune system diseases, e.g. graft vs. host disease, shock, psoriasis, etc.
                                                                                                                                                                         Human; haematopoietic cell proliferation disorder; cytostatic; gene therapy; lymphocytic leukaemia; acute myelogenous leukaemia; cytosine methylation state; probe; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          09-FEB-1995;
18-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   CD28; inhibition; antisense oligonucleotide; interleukin 2; IL-2; immune system mediated disease; gamma-interferon; IL-8; ss.
                                                                                                                                                                                                                       Haematopoietic cell proliferation disorder related oligonucleotide #82
                                                                                                                                                                                                                                                                                         ABZ09942 standard; DNA; 18 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Example;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 1996-384228/38
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            18-SEP-1995;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        US5932556-A
                                                                                                                                         Homo sapiens
Synthetic.
                                                26-MAR-2001; 2001US-0278333P
                                                                      26-MAR-2002;
                                                                                             03-OCT-2002
                                                                                                                  WO200277272-A2
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                          (EPIG-)
                                                                                                                                                                                                                                                                                                                                                                                            Local Similarity
                                                                                                                                                                                                                                                                                                                                                                      872 TACAGGCGTGAGCCAC 887
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                           EPIGENOMICS
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                                                                                                                                                                                                                                                                                                                                                                                            conservative 0;
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                                                                        2002WO-EP003401
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95US-00529878.
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                                                                                                                                                                                                                                                                                                                                                                                                                   1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       English.
                                                                                                                                                                                                                                                                                                                                                                                            Score 16; DB ;; Pred. No. 1.6
                                                                                                                                                                                                                                                                                                                                                                                                                                         G; 4 T; 0 U; 0 Other;
Ď
                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                        1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                 Length 18
                                                                                                                                                                                                                                                                                                                                                                                               Indels
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Berlin K,

Braun A,

Distler J,

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Mueller J;

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ADO56481
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AC ADO
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AC ADO
DT 12-
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Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
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Lewin A, I
Schwope I,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           lymphocytic leuksemia and acute myelogenous leuksemia; as probes for determining the cytosine methylation state and/or single nucleotide polymorphisms (SNPs) of haematopoietic cell proliferation disorder related sequences and their complements; and as primers for the amplification of haematopoietic cell proliferation disorder related DNA sequences. The nucleotide sequences from the present invention can also be used for detecting a predisposition to, differentiation between subclasses, diagnosis, prognosis, treatment and/or monitoring of haematopoietic cell proliferative disorders. The present method enables highly specific classification of haematopoietic cell proliferative disorders allowing for improved and informed treatment of patients
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention describes a method for detecting and differentiating between haematopoletic cell proliferative disorders associated with at least 1 gene and/or their regulatory regions in a subject. The method comprises contacting a target mucleic acid in a biological sample obtained from the subject with at least 1 reagent, biological sample obtained from the subject with at least 1 reagent,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   which distinguishes between methylated and non-methylated CpG dinucleotides within the target nucleic acid. ABZ09861 to ABZ11118 represent specifically claimed nucleotide sequences from the present invention. Oligonucleotides from the present invention can be used:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Detecting and differentiating between hematopoietic cell proliferative disorders, comprises contacting a target nucleic acid with a reagent that distinguishes between methylated and non-methylated CpG dinucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                differentiating between healthy haematopoietic cells and proliferative disorder haematopoietic cells; for differentiating between acute
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 37;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           gene therapy; human; ss; melanoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12-AUG-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                           melanoma associated polymorphic variation; SNP; single nucleotide polymorphism; cyclin-dependent kinase 10; CDK10; probe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADO56481 standard; DNA; 18 BP
                                                                                            06-NOV-2002;
23-JUL-2003;
                                                                                                                                                                                                                                                                                                        WO2004044164-A2
                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human cyclin-dependent kinase 10,
                                                                                                                                                                                  06-NOV-2003; 2003WO-US035879
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                                      SEQUENOM INC
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Lipscher E, Maier
I, Ziebarth H;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SEQ ID NO 82; 117pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BP; 5 A; 4 C; 6 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                            2002US-0424475P.
2003US-0489703P.
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Pred. No
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Model F, Mueller V, Otto
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CDK10
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       probe
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from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cyclin-dependent kinase 10, CDK10, proximal SNP probe.
                                                                                                                                                                                                                                                                                                                                                                                     Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                  The invention relates to a method of identifying a subject at risk of melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample
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                                                                                                                                                                                                                                                                                                                         Example 5;
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Sequence 18
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  BP;
  4 A;
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                                                                                                                                                                                                                                                                                                                           295pp; English.
  6 C; 6 G; 1 T; 0 U; 1 Other;
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RESULT 1693
AAV57826/c
ID AAV5782
XX AAV5782
AC AAV5782
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Manic-depressive illness; susceptibility; genotype; diagnosis; chromosomal marker; polymorphic marker; chromosome 18; human; myo-inositol monophosphatase protein; IMP-18p; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    07-MAY-1998
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16; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         18
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Pred. No.
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1.6e+03;
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New isolated IMP.18p myo-i products for determining s as targets for preventive

myo-inositol monophosphatase - used to ning susceptibility to manic depressive ntive and therapeutic treatments.

develop

and

Disclosure; Page 3;

118pp; English

Detera-Wadleigh Berrettini WH,

SD, Gershon ES, Badn Yoshikawa T, Sanders

Badner JA, Goldin ders AR, Esterling

28-OCT-1996; 28-OCT-1997;

96US-0029278P

97WO-US019381.

(USSH) US DEPT HEALTH & HUMAN SERVICES

WPI; 1998-272247/24

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ADF68319/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Matches 16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 19 BP; 6 A; 4 C; 7 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 cytostatic; antisense therapy; apoptosis enhancer; cancer;
lymphoproliferative disorder; leukaemia; myelodysplastic syndrome;
polycythemia vera; lymphoma; Hodykin's disease;
waldenstrom's macroglobulinemia; breast cancer; basal cell carcinoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human antisense APO2 nucleobase oligomer SEQ ID NO:164
                                               New nucleobase oligomers that inhibit expression of inhibitor of apoptosis gene, useful for treating cancer and other lymphoproliferative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     27-MAR-2002; 2002US-0367853P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               27-MAR-2003; 2003WO-IB001670
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Synthetic.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           nucleobase oligomer; inhibitor-of apoptosis inhibitor; IAP inhibitor;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Table 1 in the present invention (see AAV57798 to AAV57877)
                                                                                                                                                                                          2003-779241/73.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           carcinoma;
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                                                                                                                                                                                                                                                                                                                                                                               AEGERA THERAPEUTICS INC
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gene, useful for treat
by inducing apoptosis.
                                                                                                                                                                                                                                                                               Mcmanus
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           melanoma; retinoblastoma; human; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /*tag= a
/note= "N = T or U where each nucleobase may be part
/note= "N = T or U where each nucleobase may be part
ribonucleotide, deoxyribonucleotide, or nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Location/Qualifiers
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                                                                                                                                                                                                                                                                                    Durkin JP
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Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
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Example 1;

SEQ ID NO 164; 259pp; English

(UYQU) UNIV QUEENSLAND

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C(II) of up to 30 nucleobases in length or comprising eleven DNA residues C flanked on each side by four 2'-O-methyl RNA residues that inhibits the C expression of an inhibitor-of apoptosis (IAP) in the cell. Also C carrier; (2) a catalytic RNA molecule (III) comprising (I) and a C carrier; (2) a catalytic RNA molecule (III) comprising (I) and a C carrier; (2) a catalytic RNA molecule (IV) comprising an uncleic acid encoding one or more (III) positioned for expression in a mammalian C cell; (4) a double-stranded RNA molecule (IV) comsisting of 21-29 C nucleobases comprising at least eight consecutive nucleobases comprising at least eight consecutive nucleobases that comprise fully defined in the specification, comprising, e.g. 19 nucleobases that comprise at least eight consecutive nucleobases that comprise and a second domain complementary to the first domain, and a couple domain situated between the first and the second domains such that the first domain and the second domain are capable of duplexing to for phomogenic stranded hairpin RNA molecule; and (6) an expression vector (VI) comprising a nucleic acid molecule; and (6) an expression vector (VI) comprising a nucleic acid molecule; and (6) an expression vector (VI) comprising a nucleic acid molecule; and (6) an expression vector cuseful for treating an animal having a cancer or lymphoproliferative (I) is useful for enhancing the expression of an IAP in the double stranded RNA molecule; and (6) an expression year of a cell in an animal, preferably human the cute promyelocytic leukaemia, acute myelocytic leukaemia, acute myelocytic leukaemia, acute myelocytic leukaemia, acute explandamia conte compression of an IAP in the cell. (I) is also cute growelos between the context expression of an acute leukaemia, acute explosion of an acute symphocytic leukaemia, acute explandamia cell carcinoma, lung carci
RESULT 1695
ACA88916/c
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                     Genetic marker selection; multiplex PCR amplification; prenatal diagnostic testing; foetal sex determination; genetic identification; DNA profiling; DNA fingerprinting; forensic analysis; PCR; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                     Selection and
                                                                                                                                                                                                                                                                                                                                                                                                                             08-JUL-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ACA88916;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ACA88916 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 19 BP; 5 A; 3 C; 10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              macroglobulinemia, breast cancer, basal cell carcinoma, lung carcinoma, melanoma and retinoblastoma. The present sequence is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The present invention describes a substantially pure nucleobase oligomer (I) of up to 30 nucleobases in length or comprising eleven DNA residues
                                     12-OCT-2001; 2001AU-00008234.
12-OCT-2001; 2001AU-00008235.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             exemplification
                                                                                                      14-OCT-2002; 2002WO-AU001388.
                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                         WO2003031646-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16;
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                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                  amplification of genetic markers PCR related primer #27.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             of the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     551
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  U; 1 Other;
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RESULT 1696
AAH48599/c
ID AAH4859
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The invention describes a method of selecting genetic markers as targets for nucleic acid sequence amplification comprising selecting each of the genetic markers according to a heterozygosity index of 0.5 or greater. Selecting and amplification of genetic markers are useful as targets for nucleic acid sequence amplification, for genetic testing or facilitating multiplex PCR amplification from limiting amounts of target nucleic acid. The methods are also useful for improving genetic diagnostic acid. Screening methods, such as prenatal diagnostic testing, foetal sex determination or genetic identification, e.g. DNA profiling or DNA fingerprinting. The nucleic acid sequence amplification is also useful in forensic analysis of degraded, old, ancient and difficult samples that are difficult to amplify and identify. This sequence represents a PCR are difficult to amplify and identify. This sequence represents a PCR are difficult to amplify and identify.
                                                                                                                                                                                                                                                                                         Fascin; regulatory sequence; human; dendritic cell; antivital; cumer; antibacterial; antifungal; antiparasitic; anti-allergic; neurological; immunomodulatory; apoptotic; expression regulator; vaccine; allergen; Creutzfeld-Jakob disease; Alzheimer's disease; gene therapy; antoimmune disease; transplant rejection; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Selecting genetic markers as targets for nucleic acid sequence amplification, useful for improving genetic testing, e.g. fetal sex determination, comprises selecting each of the genetic markers according
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 36; Page 39; 64pp; English
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                                                                                                                                                                                                                                                                                                                                                                                      Human fascin associated primer SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAH48599
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAH48599 standard; DNA; 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence
                                                                                                                                                                                   12-JAN-2001;
                                                                                                                                                                                                                                                                       Homo sapiens.
            WPI; 2001-451858/48
                                                                                                                                         13-JAN-2000;
02-MAR-2000;
                                                                                                                                                                                                               19-JUL-2001
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                                        Reske-Kunz A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Local Similarity
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                                                                                  ROSS
ROSS
                                                                                                               RESKE-KUNZ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                         2000DE-01001169
2000DE-01010188
                                                                                                                                                                                   2001WO-EP000362
                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                        Ross X,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  selection and amplification of genetic markers
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     4 C;
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                                           Ross
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Pred. No.
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New regulatory sequences from the fascin gene, useful for providing dendritic cell-specific expression of e.g. antigens, e.g. for vaccination against tumors and infections.
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Claim 2b; Page 108; 117pp; German

cc allergic, neurological, immunomodulatory and apoptotic activity. (A) are cused to regulate expression of antigens, immunoregulators, antisense cc sequences etc. in DC-specific fashion. Recombinant DNA, vectors and host cells that contain (A) are useful: (1) in vaccines against viruses, antisense; and Alzheimer's disease; and (ii) for gene therapy of tumors, altergies, infections, autoimmune diseases and transplant rejection. They callergies, infections, autoimmune diseases and transplant rejection. They callergies, infections, autoimmune diseases and transplant rejection. They can also be provide specific expression of antigens and immunoregulators cl DC; for isolation and identification of cell factors and cis-elements from the degree of maturity of DC and to block transcription cetactors, by providing binding sites in DC. (A) provide DC-specific expression of nucleic acid under their control, allowing a more specific capuration of the immune response and eliminating the long and laborious purification of DC (since a complete leucocyte population may be transformed), including transformation in vitro. This sequence represents the invention This invention describes novel regulatory sequences (A) derived from human fascin that provide specific expression in dendritic cells (DC) which primer have antiviral, associated with the human fascin gene described in provide specific antibacterial, itibacterial, antifungal, antiparasitic, anti-immunomodulatory and apoptotic activity. (A) are the invention and

Sequence 20 BP; 4 A; u Ç 7 ü 4 Η. 0 u; o Other;

Matches Query Match Best Local 967 ATCTCGGCTCACTGCA 982 17 16; Similarity Conservative 100.0%; N 0 Score 16; Pred. No. Mismatches DB 1; Length 20; 1.7e+03; Indels 0 Gaps 0

RESULT 1697 AAS21754/c AAS21754 standard; DNA; 21-NOV-2001 (first entry) 20

Mouse Survivin antisense oligonucleotide #56.

hyperproliferative Survivin; human; mouse; cytostatic; antisense oligonucleotide; ve condition; cancer; apoptosis; cytokinesis; 88.

Synthetic

Mus musculus.

WO200157059-A1

09-AUG-2001

30-JAN-2001; 2001WO-US002939

02-FEB-2000; 2000US-00496694

SISI PHARM INC

Ġ, Ackermann Ę, Swayze 因 因 , 3

2001-488863/53

treatment of Novel antisense compounds cancer for modulating the expression of Survivin and

Example 18; Page 62; 120pp; English

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AAD25167
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  CC The invention relates to antisense oligonucleotides targeted to a nucleic CC acid molecule encoding human Survivin, where the antisense CC oligonucleotide inhibits the expression of human Survivin. These CC antisense oligonucleotides are used in the treatment of an animal CC suffering from a disease or condition associated with Survivin, e.g. a CC hyperproliferative condition such as cancer, and comprises administering CC atherapeutically or prophylactically effective amount of the antisense CC oligonucleotides con that expression of Survivin is inhibited. The CC disease or condition characterised by a reduction in apoptosis comprising administering the antisense oligonucleotide to the antisense oligonucleotide can be used to treat a human suffering from a CC disease or condition characterised by a reduction in apoptosis comprising CC antisense oligonucleotide to a human. In addition, the CC cantisense oligonucleotide to a human in addition, the CC cantisense oligonucleotide chemotherapeutic agent e.g. CC taxol or cisplatin, can be used to modulate apoptosis, cytokinesis or the CC cell cycle, or inhibit the proliferation in a cancer cell by contacting CC cell cycle, or inhibit the proliferation in a cancer cell by contacting CC cell cycle, or inhibit the proliferation in a cancer cell by contacting CC curvivin mucleic acids, and antisense oligonucleotides targeted to CC Survivin nucleic acids, and antisense oligonucleotides targeted to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Query Match
Best Local S
Matches 16
                                                                                                                              07-JUN-2000; 2000US-0209927P.
07-JUN-2000; 2000US-02109928P.
07-JUN-2000; 2000US-0210091P.
08-JUN-2000; 2000US-0210208P.
26-JUN-2000; 2000US-0214023P.
26-JUN-2000; 2000US-0214150P.
29-JUN-2000; 2000US-0214150P.
29-JUN-2000; 2000US-0215005P.
20-FEB-2001; 2001US-0271623P.
26-FEB-2001; 2001US-0271633P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            diabetes; seizure; muscular dystrophy; epilepsy; allergy; adenocarcin coagulation disorder; reproductive; respiratory; bone; nephrological; multiple sclerosis; mental depression; gastro-intestinal disease; can
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; NOV7b; gene therapy; atherosclerosis; cardiomyopathy; leukaemia; neurological; neurodegenerative disease; cell signalling; inflammation; diabetes; seizure; muscular dystrophy; epilepsy; allergy; adenocarcinoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAD25167 standard; DNA; 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 20
                                    Majumder K,
Zerhusen B,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human NOV7b
                                                                                                                                                                                                                                                                                                                                                                   07-JUN-2001;
                                                                                                                                                                                                                                                                                                                                                                                                         13-DEC-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                               WO200194416-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            bronchitis; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      12-MAR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     884 CCACCACGCCCGGCTT 899
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            system disorder; Addison's disease; migraine; dermatomyositis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                                              CURAGEN
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                Macdougall
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            gene expression assessing forward PCR primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 2 A; 4 C; 9 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                    Spytek KA, Tchernev VT, Gusev V, Burgess C, Li
                                                                                                                                                                                                                                                                                                                                                                   2001WO-US018675
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                  'n
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                Smithson
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; Pred. No. 1.7e+03;
                  õ
                L, Marya
Ellerman
                                                      Colman SD,
                                      Malyankar UM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Length 20;
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                                                      Padigaru
                                    Gangolli
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0;
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                                    H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  cancer;
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RESULT 1699
ADD71348/c
ID ADD71348 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The invention relates to isolated nucleic acids encoding polypeptides. CC designated NOVX polypeptides. The NOVX polypeptide and nucleic acid are useful for treating cardiomyopathy, atherosclerosis, diabetes or a CC disorder related to cell signal processing and metabolic pathway CC modulation. The NOVX polypeptide, nucleic acid and antibody are useful for treating or preventing a syndrome, e.g. various tissue/organ CC inflammation, muscular dystrophy, neurological and neurodegenerative CC diseases, cardiovascular diseases, coagulation disorders, cancers CC (leukaemia, adenocarcinoma), multiple sclerosis, respiratory diseases, CC (reproductive disorders, allergy, seizures, mental depression, epilepsy, CC gastro-intestinal diseases, bone disorders, nephrological disorders, CC urinary system disorders, immunological disorders, Addison's disease, CC urinary system disorders, immunological disorders, Addison's disease, CC migraine, dermatomyositis and bronchitis. The present sequence is a PCR compensation is incorrectly referred as SEQ ID NO: 75 in page 168 of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Nucleic acids encoding polypeptides, designated NOVX polypeptides, useful for treating a syndrome associated with a NOVX-associated disorder, e.g. cardiomyopathy, atherosclerosis, neurological and neurodegenerative
                                                                                                                                                                                                                                                                                                                                                                              diabetes; haplotype; polymorphism; diagnosis; renopathy; intron;
glutamine:fructose-6-phosphate amide transferase 1; ss; primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 20 BP; 5 A; 1 C; 8 G; 6 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example 1;
                                                                                                                                                                                                    07-SEP-2001; 2001JP-00271870.
28-MAR-2002; 2002JP-00090861.
                                                                                                                                                                                                                                                                                                                                                                                                                            GFAT 1 gene intron 3 polymorphism PCR primer #13
                                                                                                                                                                                                                                                                                                                                                                                                                                                            15-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADD71348;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2002-062612/08.
                                                                                                                                                                                                                                                                                   20-MAR-2003
                                                                                                                                                                                                                                                                                                                  WO2003023063-A1
                                                                                                                                                                                                                                                                                                                                                  Homo sapiens
                                                                                                                                        Itakura M,
                                                                                                                                                                                                                                                    06-SEP-2002; 2002WO-JP009093.
                                                                                                                                                                       (SANY ) SANKYO CO LTD:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          473 GGATGAAGTGCAGTGG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     16;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      GGATGAAGTGCAGTGG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Page 168; 189pp;
                                                                                                                                        Yasumo H,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     100.0%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.6%;
                                                                                                                                           Watanabe
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 16;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length 20;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
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Judging relative onset risk of diabetes including type I or II diabetes and renopathy with or without type II diabetes accompanying, by detecti

polymorphism from human

genomic DNA

detecting

2003-313261/30

Example 2; haplotype with

SEQ

ä gene ö

20; 157pp; Japanese

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PRINCE PR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RESULT 1700
ADL24993/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    CC comprising detecting a haplotype consisting of gene polymorphism at 1 or CC more positions selected from (a)- (h) from a specimen containing human CC genomic DNA supplied by a patient: (a) the nucleotide located at position 36 of the intron 1 on GFAT1 (glutamine:fructose-6-phosphate amide CC transferase 1) gene (nucleotide number 632 in sequence ADD71329; (b) the CC nucleotide located at position 7 of the intron 11 on GFAT1 gene (nucleotide located at position 266 in sequence ADD71330; (c) the nucleotide number 386 in sequence ADD71331; (d) the nucleotide located at position -147 of the intron 12 on GFAT1 gene (nucleotide number 338 in CC sequence ADD71331; (d) the nucleotide numbers 336-360 in sequence CC ADD71332; (e) the nucleotide located at positions 1853-1877 of CC the intron 8 on GFAT1 gene (nucleotide numbers 338-340 in sequence ADD71332; (e) the nucleotide numbers 328-347 in sequence ADD71333; (f) CC the nucleotide located at position -11 to -22 of the intron 18 on GFAT1 gene (nucleotide numbers 328-347 in sequence ADD71333; (f) c) che nucleotide numbers 253-264 in sequence ADD71334; (g) the nucleotide content at position -11 to -22 of the intron 18 on GFAT1 Gene (nucleotide numbers 253-264 in sequence ADD71334; (g) the nucleotide content at position 5632-2661 of the intron 3 on GFAT1 gene (nucleotide number 225 in CC sequence ADD71351). The method is useful for judging relative onset risk cof diabetes accompanying. This sequence represents a PCR primer used ct o amplify intron 3 of the GFAT1 gene in order to determine polymorphisms of the sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        inflammatory bowel disease; glutenenteropathy; infectious disease; autoimmune disease; haemolytic anaemia; rheumatoid arthritis; dermatitis Grave's disease; multiple sclerosis; allergy; asthma; diabetic mellitus; immune system disorder; hypersensitivity; anaphylaxis; blood group incompatibility; ss; human; PCR; primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADL24993 standard; DNA; 20 BP
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                                                                                                                                                                                                                                                                                                                                                                                       04-APR-2001; 2001US-0281416P
                                                                                                                                                                                                                                                                                                                                                                                                                                                         04-APR-2002; 2002WO-US010873
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO200280852-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              intestinal epithelium cell development; peyer's patch M cell development; inflammatory bowel disease; glutenenteropathy; infectious disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                20-MAY-2004
                                                                                                                                                                                                WPI; 2003-075470/07
                                                                                                                                                                                                                                                                                                                             (DIGI-) DIGITAL GENE TECHNOLOGIES
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              epithelium/peyer's patch M cell-associated PCR primer #138
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
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                                                                                                                                                                                                                                                           Byrne D,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   100.0%;
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                                                                                                                                                                                                                                                              O'mahony
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Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                             INC.
                                                                                                                                                                                                                                                              Evans
                                                                                                                                                                                                                                                              ÇĘ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0
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맑 S

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The invention comprises DNA sequences which are associated with intestinal epithelium and peyer's patch M cells. The DNA sequences of th invention are useful for assessing, modifying, modulating or regulating intestinal epithelium or M cell development. The DNA sequences of the invention are also useful in the treatment of: inflammatory bowel disease, glutenenteropathy, infectious disease, autoimmune diseases (e.g. haemolytic annemia, rheumatoid arthritis, dermatitis, Grave's disease, multiple sclerosis, allergy, asthma and diabetic mellitus), diseases or disorders of the immune system, hypersensitivity, anaphylaxis, and blood group incompatibility. The present DNA sequence represents a PCR primer that was used to amplify an intestinal epithelium/peyer's patch M cell-associated DNA sequence of the invention
Sequence 20 BP; 5 A; 8 C; 3 G; 4 T; 0 U; 0 Other;
                                                                   of the invention
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RESULT 1701
ADO81026/c
                                                                 Query Match
Best Local S
Matches 16
                                           393 TGCTGGGATTACAGGC
                                 20
                                                                  16;
                                                                         Similarity
                                 TGCTGGGATTACAGGC
                                                                  Conservative
                                                                         100.0%;
                                                  408
                                 տ
                                                                  0
                                                                          Score 16;
Pred. No.
                                                                  Mismatches
                                                                                  DB 1;
                                                                          1.7e+03;
                                                                  0,
                                                                                  Length 20;
                                                                   Indels
                                                                  0;
                                                                  Gaps
                                                                   0
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밁 S

gene typing; polymorphic microsatellite loci; PML; disease predisposition; microsatellite marker; prion disease; cystic fibrosis; malignant hyperthermia syndrome; metabolic disease; milk protein; hormone; transcription factor; pT7-blue-vector; human; ADO81026 standard; DNA; DE10236711-A1 Homo Human prion protein microsatellite locus 29-JUL-2004 ADO81026; polymorphic microsatellite loci; (first entry) primer; 20 primer #22.

09-AUG-2002; 2002DE-01036711. 26-FEB-2004.

09-AUG-2002; 2002DE-01036711.

(UYHO-) UNIV HOHENHEIM

Geldermann H, Preuss ß

Typing genes that contain polymorphic microsatellite loci, useful identifying predisposition to disease, by amplification and determ length of amplicons. determining

Example 3; Page 34; 64pp; German

The invention describes a method of typing (M1) a gene (I) that has one or more polymorphic microsatellite loci (PML). The method comprises: PCR amplification of at least one DNA region of (I) that includes PML, using as template a DNA sample containing at least one segment of (I); and determining the length of the resulting amplicon(s). Also described are: a method of determining (M2) microsatellite markers (MM) for predisposition to a disease, associated with a gene that includes one or and prediagnosis (M3) of diseases associated with gene ML. The method is used to identify microsatellite marker elated gene, that are associated with a predisposition t that

Novel isolated or purified polypeptide encoded by genes associated with intestinal epithelium or M cell development, differentiation or function useful for treating autoimmune diseases and infectious diseases.

Disclosure;

SEQ

ID NO 503; 152pp; English

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                                                      Matches
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Matches 16; Conserv
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                                                                                    Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             diseases and for prediagnosis of such diseases, especially prion diseases but also cystic fibrosis, malignant hyperthermia syndrome in pigs and metabolic diseases; also to type genes that encode milk proteins, hormones or transcription factors. The method is simpler, quicker and particularly less expensive than known methods based on sequencing. This sequence represents a primer used to genotype a region of the human prion protein (PrP) comprising a polymorphic microsatellite locus.
                                                                                                                 Sequence 41 BP; 6 A; 16 C; 9 G; 10 T; 0 U; 0 Other;
                                                                                                                                                       The invention relates to a human protein designated 10.01, containing the Phe-His aminolyase active site. Also disclosed are the encoding polynucleotide, and a method for preparing the polypeptide by DNA recombination. The application of the polypeptide is in treating arrhythmia and diabetes. Also disclosed are the antagonist against this polypeptide and its therapeutic action, and the application of the polynucleotide. The current sequence represents a human protein 10.01
                                                                                                                                                                                                                                                                                                         New human protein 10.01 containing Phe-His aminolyase active site and encoding polynucleotide, useful for treating arrhythmia and diabetes.
                                                                                                                                                                                                                                                                                                                                                                                   Mao Y,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 CN1342770-A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; 10.01;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human protein
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ABV77328;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 20
                                                                                                                                                                                                                                                                            Example 7; Page 21 (disclosure); 33pp; Chinese.
                                                                                                                                                                                                                                                                                                                                                                                                                                           12-SEP-2000; 2000CN-00125186
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     03-APR-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                (BODE-)
                                                                      Local
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                           651
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32
                                                                                                                                                                                                                                                                                                                                                                                                              BODE GENE DEV
                                                                      Similarity
                                                                                                                                               probe sequence
                         GGAGTGCAGTGGCGCAATCTTGGCTCACTGCA 682
GGGTTGCAGTGAACCAAGATTGCGCCACTGCA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AATCTTGGCTCACTGC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 6 A; 3 C; 6 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        10.01 related probe 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           aminolyase active site; arrhythmia; diabetes; probe; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DNA; 41 BP
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                                                                       68.88;
                                                                                                                                                                                                                                                                                                                                                                                                                CO LTD SHANGHAI
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Pred. No.
                                                                       Score 16;
Pred. No.
                                                        Mismatches
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                                                                       2.1e+03;
                                                                                     DB 1;
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                                                        10;
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                                                                                    Length 41;
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RESULT 1703

RESULT 1704
AAQ82623/c
ID AAQ8262
XX
AC AAQ8262
XX
AC AAQ8262
XX
DT 25-MAR-

25-MAR-2003 AAQ82623;

(revised)

AAQ82623 standard; DNA; 19

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AA173524/o
ID AA1735
XX
AC AA1735
XX
AC AA1735
XX
DT 09-NOV
DX Human
XX
Human
XX
Homo 8
XX
Homo 8
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Homo 8
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Homo 8
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Homo 9
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Homo 8
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Homo 
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                                                                                                                                                                                                                                                                                                                                                                                              CC sequences (I) may be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic and quantitate the prospection of antitate the patrents of polymorphic or contain a patient's genome that affect the activity of polypeptides (CC elambian) in a patient's genome that affect the activity of polypeptides or colypeptides of polypeptides or colypeptides of polypeptides or colypeptides of polypeptides. For colypeptide in patient's genome that affect the activity of polypeptides or colypeptides by expressing inactive proteins or to supplement the patients own colypeptides be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and colypeptides encoded by (I) may be used as antigens in the production of polypeptides or colypeptides encoded by (I) may be used as antigens in the production of polypeptides of second of antibodies specific for polymorphic polypeptides. The antibodies may also be used as diagnostic agents for detecting the presence of polypeptides of antibodies may also be used as diagnostic agents for detecting the presence of polymorphic polymorphic polymorphic polymorphic polymorphic agents for detecting the presence of polymorphic agents for detecting the presence of polymorphic polymorphic polymorphic polymorphic polymorphic agents for detecting the presence of polymorphic polymorphic agents for detecting the presence of polymorphic polymorphic agents for detecting the presence of polymorphic polymo
                                                                                                                                                Query Match
Best Local S
Matches 22
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AAI73524;
                                                                                                                                                                                                                                                                                                    Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2001-356160/37.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Shimkets
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                30-NOV-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  30-NOV-2000; 2000WO-US032758.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                07-JUN-2001.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human silent SNP containing nucleic acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     09-NOV-2001
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Polymorphic nucleic acid sequences, useful in genetic testing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         29-NOV-2000;
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                                                                                                                                                                                   Local Similarity
51
                                                                                                                                                                                                                                                                                                        51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Page 196; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ₽,
                                                                      rcrrearcregaccrrerearcreccrece 848
TCATGAGGTCAGGAGTTTGAGACCAGCCTGGC
                                                                                                                                                                                                                                                                                                        BP;
                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         2000US-00726173
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                                                                                                                                                                                                                                                                                                        10
                                                                                                                                                                                                                                                                                                                                                                                  samples
                                                                                                                                                                                                                                                                                                        A; 14 C;
                                                                                                                                                                                   1.6%;
                                                                                                                                                                                                                                                                                                        13
                                                                                                                                                    0;
                                                                                                                                                                                           Score 16;
Pred. No.
                                                                                                                                                                                                                                                                                                        <u>ი</u>
                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                        14 T; 0 U; 0 Other;
                                                                                                                                                                                   2e+03;
                                                                                                                                                                                                                              DB 1;
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                                                                                                                                                    10;
                                                                                                                                                                                                                          Length
                                                                                                                                                    Indels
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RESULT 1705
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Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                           for STS primer prediction by computer analysis (using the "Primer" program available from E.Lander, MIT). The STSs and cosmids were mapped by in situ hybridisation, somatic cell hybrid analysis or both. Using this method, 370 STSs specific for human chromosome 11 were generated and most of them were regionally mapped. This procedure illustrates a novel method for sequencing complex genomes, designated "sequence sampled mapping". The sequence sampled mapping method is useful for the completion of high density sequence-based maps, and ultimately, for the complete sequencing of genomic DNA directly from cosmid clones. See AAQ82001-082706 and AAQ91325-Q91358 for STS primers. (Updated on 25-MAR-2003 to correct PN field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    sequence sampled mapping; genomic analysis; complex genome mapping;
cosmid library; chromosome 11; sequence tagged site; STS analysis; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14-SEP-1995
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequencing complex genomes, present as fragments in a cosmid library - sequencing end-specific nucleotides of each clone then correlating with spatial relationship of cosmid, esp. for mammalian chromosomes.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             W09429486-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequences were determined from the ends of chromosome 11-specific cosmids by automated sequencing without intermediate subcloning. A sample of 371 DNA sequence fragments were determined and of these, 277 were suitable for STS primer prediction by computer analysis (using the "Primer"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 4; Page 90; 128pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               22-DEC-1994
                                                                                                                                            04-AUG-1995
                                                                                                                                                                        AAQ75552
                                                                                                                                                                                                     AAQ75552
                                                                                                                                                                                                                                                                                                                                                                                                  Sequence
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                                                                                                               Reverse transcription
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (SALK ) SALK INST BIOLOGICAL STUDIES
                                                                    aggregate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1995-036508/05
                                                                                                                                                                                                                                                                                                          637
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                                                                                                                                                                                                                                                                             19
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                                                                                                                                                                                                     standard; DNA; 19
                                                                                                                                                                                                                                                                             CTGTCACCGAGGCTGAAGT 1
                                                                                                                                                                                                                                                                                                          CTGTCACCCAGGCTGGAGT 655
                                                                                 gene expression; reverse transcription; primer; cDNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Smith MW
                                                                     restriction enzyme;
                                                                                                                                                                                                                                                                                                                                                                                                  BP; 4 A; 6 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first
                                                                                                                                            (first entry)
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93US-00117952.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               entry)
                                                                                                                                                                                                                                                                                                                                                     89.5%;
                                                                                                                                                                                                                                                                                                                                                                     1.6%;
                                                                                                               primer
                                                                                                                                                                                                       ВÞ
                                                                                                                                                                                                                                                                                                                                         0;
                                                                                                                                                                                                                                                                                                                                                       Score 15.8;
Pred. No. 1
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                                                                                                                used in cDNA analysis technique.
                                                                                                                                                                                                                                                                                                                                       Mismatches
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                                                                                                                                                                                                                                                                                                                                                        1.7e+03
                                                                                                                                                                                                                                                                                                                                                                     DB 1;
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                                                                                                                                                                                                                                                                                                                                                                   Length 19;
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RESULT 1706
AAQ95836
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                A method for the analysis of cDNA comprises (a) preparing an aggregate double-stranded cDNAs by using an aggregate of mRNAs and a plural type labelled reverse transcription primers (GENESEQ files AAQ75547-Q75798) and using the aggregate of mRNAs as the template for each reverse transcription primer; (b) digesting each of the prepared aggregates of the double-stranded cDNAs with restriction enzyme and; (c) electrophoresing the digested aggregate of cDNAs in seperate lanes. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Analysis of cDNA and gene expression -
by digestion with restriction enzymes.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      01-NOV-1994.
                                            Kit for automated genotyping contg. pairs of PCR primers - designed to amplify polymorphic nucleotide repeat sequences, arranged in sets each with a characteristic fluorescence label, useful e.g. in detection of disease related genetic rearrangement.
                                                                                                                                                                                                                                                                                                                             primer; polymerase chain reaction; PCR; linkage study; locus;
microsatellite marker sequence; automated genotyping; allele;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     method can be used to analyse gene expression rapidly and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Disclosure; Page 5; llpp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 1995-018287/03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     16-APR-1993;
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                      Disclosure; Fig 7J-3; 104pp; English.
                                                                                                             WPI; 1995-215278/28.
                                                                                                                                     Levitt RC
                                                                                                                                                                                     03-DEC-1993;
                                                                                                                                                                                                                                       08-JUN-1995
                                                                                                                                                                                                                                                                                        Synthetic.
                                                                                                                                                                                                                                                                                                                 polymorphism;
                                                                                                                                                                                                                                                                                                                                                                     Primer B (Group 10,
                                                                                                                                                                                                                                                                                                                                                                                              20-FEB-1996
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                                                                                                                                                              (UYJO ) UNIV
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                                                                                                                                                               JOHNS HOPKINS
                                                                                                                                                                                                                                                                                                                                                                                            (first
                                                                                                                                                                                                                                                                                                                  detection; Homo sapiens; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            TELEGRAPH & TELEPHONE CORP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              93JP-00112515
                                                                                                                                                                                       93US-00160837
                                                                                                                                                                                                                94WO-US013945
                                                                                                                                                                                                                                                                                                                                                                     set C) for marker D13S164, chromosome
                                                                                                                                                                                                                                                                                                                                                                                            entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             <u>.</u>
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         easily
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The method aims to provide a collection of highly reproducible

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RESULT 1707
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  microsatellite marker sequences (MMS) at approx. 10-50 cM intervals throughout the human genome which can be detectably labelled. The MMS are polymorphic, simple sequence repeats and can be used in automated genotyping. esp. fluorescence-based. The primers correspond to the unique DNA sequence surrounding each marker, and PCR is used to detect each polymorphism. When the MMS show considerable polymorphism (ie. a difference in the number of repeats) between individuals, the markers can be particularly informative. The MMS can be ideal for linkage studies. Kits comprise at least 4 groups, of at least 3 sets, each comprising labelled primers for PCR amplification of the DNA. Group 10 primer pairs are shown in AAQ95819-40. The published size range of the D13S164 allele is 208-219 bp, and the degree of heterozygosity in the population is
The sequences given in AAT10742-67 are synthetic oligonucleotides which are used in the construction of the electronically self- addressable device (ED) of the invention. The ED comprises a substrate, an electrode or opt. a number of electrodes supported by the substrate, a current source operatively connected to the electrode and an attachment layer adjacent to the electrode which is permeable to a counterion but not permeable to a molecule capable of insulating or binding to the electrode. The attachment layer is capable of attaching a macromolecule.
                                                                                                                                                                                                                                                                                  Electronically self-addressable device e.g. nucleic acid hybridisation.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Key
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Electronically self-addressable device; ED; electrode; current source; attachment layer; permeable; counterion; genetic typing; probe;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Oligonucleotide probe,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      09-SEP-1996
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                                                                                                                                                                                                                                                                                                                                                                                                                  Heller
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                07-JUL-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  05-JUL-1995;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 detection;
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                                                                                                                                                                                                                                                                                                                                                              WPI; 1996-097582/10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    25-JAN-1996.
                                                                                                                                                                                                                                   Example 1; Page 61;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (NANO-) NANOGEN INC
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17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                             Tu E, Evans
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 BP; 6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  95WO-US008570
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /*tag= a
/note= "5'-amino terminus"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     RNA;
                                                                                                                                                                                                                                155pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 6 C; 4 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  T-2.
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Pred. No. 1.7e+03;
0; Mismatches 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               19
                                                                                                                                                                                                                                                                                                                                                                                                             Sosnowski
                                                                                                                                                                                                                                                                                                               1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1; Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                            electronic control
                                                                                                                                  an electrode
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Query Match Best Local Sim Matches 17;

Similarity

89.5%;

Score 15.8; DI Pred. No. 1.7e-0; Mismatches

.7e+03

DB 1;

Length 19; Indels

0

Gaps

0

. 68 ;

Conservative

0

Sequence 19

BP; 6 A;

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RESULT 1708
AAT66018/c
ID AAT6601
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AC AAT6601
XX
XX
XX
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Best Local
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                                     The invention relates to the isolation of polymorphic repeat sequences having the sequence (dC-dA)n. (dG-dT)n which can be used as genetic markers. Primers based on these sequences can be used to detect these repeats, especially for use in e.g paternity or maternity testing, human genetic analysis such as linkage analysis of genetic disease, commercial animal or plant breeding or pedigree analysis. Clones containing the repeat sequences were isolated by hybridisation of chromosome-specific phage libraries with a synthetic poly(dC-dA). (dG-dT) probe. Over 100 repeat blocks were isolated. The primers AAT65798-T66047 were used to PCR amplify the inserts from the isolated clones containing the repeat sequences. The primers AAT66018-9 were used to amplify the repeat sequence marker clone Mfd111 (AAT65782). (Updated on 25-MAR-2003 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               binding entity, such as one of these probes, attached to each of locations capable of detecting the presence of a genetic sequence
                                                                                                                                                                                                                                                Claim 7; Col
                                                                                                                                                                                                                                                                                                                                                                                                                      21-APR-1989;
05-SEP-1991;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     04-APR-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  10-DEC-1996
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            hybridisation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Polymorphism; repeat sequence; genetic marker; primer; amplificati PCR; polymerase chain reaction; paternity; maternity; human; pedig linkage analysis; genetic disease; animal; plant; breeding; locus;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Primer #1 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     25-MAR-2003
18-JUN-1997
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAT66018;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAT66018
                                                                                                                                                                                                                                                                             Detection of polymorphic genetic markers of the form (dC-dA)n(dG-dT)n using novel nucleic acid mols, as primers.
                                                                                                                                                                                                                                                                                                                            WPI; 1997-042299/04
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               US5582979-A
                                                                                                                                                                                                                                                                                                                                                                                       (MARS-) MARSHFIELD CLINIC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 he ED is used for genetic typing and comprises a number of lectronically addressable locations each comprising an electrode,
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17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 standard;
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                              field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                              13-14; 186pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      amplify repeat sequence marker Mfd111
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               chromosome;
                                                                                                                                                                                                                                                                                                                                                                                                                      89US-00341562.
91US-00754351.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     94US-00222177.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DNA; 19
5 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        89.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.6%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           amplification;
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RESULT 1709
AAV85747/C
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XX AAV8574
AC AAV8578
AC CC AAV8588
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Matches 17
                                                                                                                                                                                                                                                 The present invention describes LRP5 (low density lipoprotein (LDL) receptor related protein, previously designated LRP-3). AAV85872 represent exon primers used for obtaining LRP5 CDNA. Nucleic acid molecules (NAMS) encoding LRP5 can be used for determining if an individual is susceptible to insulin dependent diabetes mellitus (IDDM). The NAMS or proteins can be used for reducing triglyceride levels in the serum of an individual. Therapies that affect LRP5 may also be useful in the treatment of autoimmune diseases such as glomerulonephritis, diseases and disorders involving disruption of endocytosis and/or antigen presentation, cytokine clearance and/or inflammation, vital infection, pathogenic bacterial toxin contamination, elevation of free fatty acids or hypercholesterolemia, type 2 diabetes, osteoporosis, Alzheimer's disease and cardiovascular disease. Products from the present invention can also be used for detection, diagnosis and drug screening
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Tov P, Kawaguchi
Twe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         LRP5; LDL-receptor related protein; LRP-3; LDLM; diagnosis; endocyt
insulln dependent diabetes mellitus; autoimmune disease;
glomerulonephritis; inflammation; viral infection; osteoporosis;
hypercholesterolemia; Alzheimer's disease; low density lipoprotein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAV85747 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated LDL-receptor related protein - used to develop products treating, e.g. elevated triglyceride levels, diabetes, autoimmune disorders, inflammation or Alzheimer's disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              15-APR-1997;
05-JUN-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            10-FEB-1999
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 12; Page 105; 200pp;
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                                     CACCACGCCTAGCTAATTT 769
                                                                                                                                                                                                           19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer
  CACCATGCCTGGCTAATTT 1
                                                                                                                                                                                                        вP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              97US-0043553P
97US-0048740P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Caskey CT, Cox RD, Gerhold D, Hammo
Merriman TR, Metzker ML, Nakagawa
                                                                                                                            1.6%;
89.5%;
                                                                                                                                                                                                        3 C; 6
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  English.
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                                                                                                                                                                                                           G; 4 T; 0
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                                                                                                                            Score 15.8;
Pred. No. 1.
                                                                                                    Mismatches
                                                                                                                                                                                                           U; 0 Other;
                                                                                                                               1.7e+03
                                                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          diagnosis; endocytosis;
                                                                                                                                                       Length 19;
                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Hammond
                                                                                                    0;
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                                                                                                       Gaps
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RESULT 1710
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                                                                Query Match
Best Local
                                                      Matches
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Hey P, Kawaguchi Y,
Phillips MS, Twells P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               insulin dependent diabetes mellitus; autoimmune disease; glomerulonephritis; inflammation; viral infection; osteoporosis; hypercholesterolemia; Alzheimer's disease; low density lipoprotein;
                                                                                                                                                                                      The present invention describes LRP5 (low density lipoprotein (LDL) receptor related protein, previously designated LRP-3). AAV85823 to AAV85900 represent SNP primers used for obtaining LRP5 cDNA. Nucleic acid molecules (NAMs) encoding LRP5 can be used for determining if an individual is susceptible to insulin dependent diabetes mellitus (IDDM). The NAMs or proteins can be used for reducing triglyceride levels in the serum of an individual. Therapies that affect LRP5 may also be useful in the treatment of autoimmune diseases such as glomerulonephritis, diseases and disorders involving disruption of endocytosis and/or antigen presentation, cytokine clearance and/or inflammation, tral infection,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAV85825;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAV85825 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                    New isolated LDL-receptor related protein - used to develop products for treating, e.g. elevated triglyceride levels, diabetes, autoimmune disorders, inflammation or Alzheimer's disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 15-APR-1997;
05-JUN-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Synthetic.
                                                                                                       Sequence
                                                                                                                                               pathogenic bacterial toxin contamination, elevation of free fatty acids or hypercholesterolemia, type 2 diabetes, osteoporosis, Alzheimer's disease and cardiovascular disease Products from the present invention
                                                                                                                                                                                                                                                                                                                                          Claim 12; Page 110; 200pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 1998-594573/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (WELL )
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           15-APR-1998;
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                                                                                                                                   can also
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  primer;
                  751 CACCACGCCTAGCTAATTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           LDL-receptor related
19
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MERCK & C
                                                                  Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Hess JW, c
                                                                                                         19
CACCATGCCTGGCTAATTT
                                                                                                                                   be used for detection, diagnosis and drug
                                                                                                         BP; 6
                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first
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97US-0048740P
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                                                                                                         A; 3 C; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Caskey CT,
Merriman
                                                                                                                                                                                                                                                                                                                                                                                                                                                      RCJ;
                                                                 1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          protein; LRP-3; IDDM; diagnosis;
                                                      0,
                                                                                                          G; 4 T; 0
                            769
                                                                 Score 15.8;
Pred. No. 1.7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Cox RD, Gerhold TR, Metzker ML,
                                                       Mismatches
                                                                                                          U; 0 Other;
                                                                 1.7e+03;
                                                                                 DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    D, Hammo
Nakagawa
                                                                              Length 19;
                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Hammond
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              endocytosis;
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RESULT 1711 AAV85662/c

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RESULT 1712
AAV07878
ID AAV07878
XX
AC AAV0787
XX
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                               the treatment of autoimmune diseases such as glomerulonephritis, diseases and disorders involving disruption of endocytosis and/or antigen presentation, cytokine clearance and/or inflammation, viral infection, pathogenic bacterial toxin contamination, elevation of free fatty acids or hypercholesterolemia, type 2 diabetes, osteoporosis, Alzheimer's disease and cardiovascular disease. Products from the present invention
                                                                                                                                                                                                                                                                                                                                                                   The present invention describes LRP5 (low density lipoprotein (LDL) receptor related protein, previously designated LRP-3). AAV85587 to AAV85822 represent exon primers used for obtaining LRP5 cDNA. Nucleic acid molecules (NAMs) encoding LRP5 can be used for determining if an individual is susceptible to insulin dependent diabetes mellitus (LDDM). The NAMs or proteins can be used for reducing triglyceride levels in the serum of an individual. Therapies that affect LRP5 may also be useful in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated LDL-receptor related protein - used to develop products treating, e.g. elevated triglyceride levels, diabetes, autoimmune disorders, inflammation or Alzheimer's disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Todd JA, Hess JW, Caskey
Hey P, Kawaguchi Y, Merz
Phillips MS, Twells RCJ;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      LRP5; LDL-receptor related protein; LRP-3; IDDM; diagnosis; endocytosis; insulin dependent diabetes mellitus; autoimmune disease; glomerulonephritis; inflammation; viral infection; osteoporosis; hypercholesterolemia; Alzheimer's disease; low density lipoprotein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAV85662;
               AAV07878;
                                                                                                                                                                                                                                    Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 1998-594573/50.
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05-JUN-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             10-FEB-1999
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                                                                                                                                                                                                                                                                    can also be used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Homo
                                            AAV07878 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (WELL ) WELLCOME TRUST LTD (MERI ) MERCK & CO INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                exon primer ElxI 1f.
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                                                                                                                                                993
                                                                                                                      19
                                                                                                                                                                                            Similarity
                                                                                                                                                 CCCGGGCTCAAGCGATTCT 1011
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Page 102; 200pp; English.
                                                                                                                                                                                                                                       BP; 6
                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
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97US-0048740P
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                                                                                                                                                                                                                                                                 for detection,
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Merriman
                                                                                                                                                                                       1.6%;
89.5%;
                                                                                                                                                                                                                                       5 C; 5 G; 3 T; 0 U; 0 Other;
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                                            ₿P
                                                                                                                                                                             0,
                                                                                                                                                                                            Score 15.8;
Pred. No. 1.
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                                                                                                                                                                                                                                                                 diagnosis and drug screening
                                                                                                                                                                              Mismatches
                                                                                                                                                                                           1.7e+03;
                                                                                                                                                                                                          DB 1; Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1 D, Hammo
Nakagawa
                                                                                                                                                                                Indels
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kagawa Y;
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RESULT 1713
AAV06820
ID AAV0682
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                                                                                                                                                                                                                                                                     Matches
                                                                                                                                                                                                                                                                               Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                        The invention relates to aminooxy-modified(oligo)nucleotides or nucleosides which are useful as therapeutics, diagnostics, and research reagents. They may be used, e.g., for modulation of the ras gene and may be able to modulate the process of transformation from normal to malignant cell growth. They may be prepared using known methods. Inclusion of the aminooxy moieties can improve binding of oligonucleotides to complementary strands. The moieties can also provide conjugation sites useful for conjugation of useful ligands (e.g. reporter groups and groups for modifying uptake, distribution or other pharmacodynamic properties) to oligonucleotides. The present sequence represents an example of an aminooxy-modified oligonucleotide disclosed in the specification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     14-FEB-1997;
30-JAN-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Synthetic
 Key
                                                                                                                                                                                                                                                                                                                   Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure; Page 84; 131pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New aminooxy-modified oligonucleotides - which can show improved binding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Cook PD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           13-FEB-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           nuclease resistance; reporter group; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      phosphorothicate; ras gene; malignant cell growth; amincoxy-modified;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Aminooxy-modified oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         14-DEC-1998
                         Synthetic
                                                  oligonucleotide;
                                                                           Oligonucleotide
                                                                                                    13-OCT-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     to complementary strands and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 1998-568232/48.
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                                                                                                                             AAV06820;
                                                                                                                                                      AAV06820 standard;
                                                                                                                                                                                                                                            427
                                                                                                                                                                                                                                                                     17;
                                                                                                                                                                                                                                                                                 Similarity
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                                                                                                                                                                                                                                                                     Conservative
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                                                                                                    (first entry)
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                                                                           containing
Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /note= "5-methyl, 2'-aminooxyethoxy-thymidine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  /*tag=
                                                   88
                                                                                                                                                      DNA; 19
                                                                                                                                                                                                                                                                               89.5%;
                                                                                                                                                                                                                                                                                             1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Kawasaki
                                                                                                                                                      В₽
                                                                            modified internucleotide linkage
                                                                                                                                                                                                                                                                    0
                                                                                                                                                                                                                                            445
                                                                                                                                                                                                                                                                               Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        improved resistance
                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       A
                                                                                                                                                                                                                                                                                  1.7e+03;
                                                                                                                                                                                                                                                                                             DB 1; Length 19;
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RESULT 1714
AAX81316
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates, inter alia, to a method of preparing an oligonucleotide by coupling (1) a new nucleoside having a protected 5'-hydroxy group and at the 3'-position a group of formula -CH2-P(OR3)-NRAR5, with (2) a nucleoside or oligonucleotide having a free 5'-hydroxy group, to give (3) a precursor having an internucleoside linkage of formula -CH2-P(OR3)-O-; and converting this to a linkage of formula -CH2-P(OR3)(-X)-O- (where X = S or O). The present sequence is a specific example of an oligonucleotide so prepared
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New tetra:hydro:furan oligo:nucleotide(s).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                            Microelectronic device; multi-step reaction; microscopic format; ion-permeable permeation layer; electrode; electrical control; transport; attachment; binding; DNA/RNA hybrid; probe; ss.
                                                                                                                                                                                          5' amino oligonucleotide probe
                                                                                                                                                                                                                                                              AAX81316 standard; DNA; 19 BP
                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Example 12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 1998-052233/05.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Collingwood
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                                                                                                                        Synthetic
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01-DEC-1998;
                      17-JUN-1999
                                             WO9929711-A1
                                                                                        misc_feature
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17; Conserv
                                                                                                                                                                                                                                                                                                                                    TTTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                      TTTTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Page 29; 37pp;
                                                                                                                                                                                                                                                                                                                                                                                                              BP; 0
                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   96GB-00012600
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /*tag= a
/note= "these T residues are formed as part of a
conventional phosphoramidite oligonucleotide synthesis
process but using as the reactant a thymosine nucleoside
having at the 3'-position a group of formula -CH2-
P(OCH2CH2CN)-N(iPr)2"
 98WO-US025475
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 16.
                                                                                                  Location/Qualifiers
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                                                                note= "amino group attached at
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                                                                                                                                                                                                                                                                                                                                                                            1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                               0 C; 0
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         English
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                                                                                                                                                                                                                                                                                                                                                                                                               G; 19 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Altmann
                                                                                                                                                                                                                                                                                                                                                                              Score 15.8; DB 1; Pred. No. 1.7e+03;
                                                                                                                                                                                             T-2.
                                                                                                                                                                                                                                                                                                                                                                   Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Douglas ME
                                                                                                                                                                                                                                                                                                                                                                                                               0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                         Length 19;
                                                                                                                                                                                                                                                                                                                                                                    Indels
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                                                                  terminal"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ō.
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The specification describes a self-addressable, self-assembling control multi-step and multiplex molecular biological reactions in control multi-step and multiplex molecular biological reactions in comic microscopic formats. A key aspect of this inventions is played by the ion comparemeable permeation layer which overlies the electrode. This permeation comparement of nucleic acids to permit immobilization but call of the sequences from the highly reactive electrochemical environment generated commendately at the electrode surface. The microelectronic device is consigned and fabricated to actively carry out and control reactions such comparation, diagnostics and biopolymer synthesis. The device can comparation, diagnostics and biopolymer synthesis. The device can comparations. The device can subsequently control the transport and attachment of specific micro-comparations. The device can subsequently control the transport and reactions. The device is able to concentrate analytes and reactants, remove non-comparate concentrate annotation of analytes. The device is and improve the detection of analytes. The concentrate annotation and improve control for DNA concentrates and approve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes. The concentrate annotation and improve the detection of analytes.
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05-DEC-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sosnowski
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New microelectronic device designed to carry and multiplex molecular biological reactions
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 1999-385567/32
Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (NANO-) NANOGEN INC.
                                                                                           sequence represents a probe used to exemplify the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Page 90; 179pp;
ВP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      97US-00986065
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Butler
0 A;
0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Æ,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      out and control multi-step in microscopic format.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Heller MJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Edman CF;
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Query Match
Best Local
                           Matches
             427
ш
                           17;
                                   Similarity
      TTTTATTTATTTTTTT 445
TTTTTTTTTTTTTTTTTT 19
                           Conservative
                                  1.6%;
                           0;
                                  Score 15.8;
Pred. No. 1.
                             Mismatches
                                    7e+03
                                          DB 1;
                             2;
                                          Length
                             Indels
                                            19
                             0,
                             Gaps
                             0
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RESULT 1715
AAX36671/c
ID AAX3667
Synthetic
                                                                                                                         presymptomatic glaucoma; symptomatic glaucoma;
                                                                                                                                   PCR primer; detection; chromosome 2; chromosome
                                                                                                                                                                                                               .671/c
AAX36671 standard; DNA; 19
         (UYLA-) UNIV LAVAL
                          30-SEP-1997;
                                            29-SEP-1998;
                                                              08-APR-1999.
                                                                               WO9916899-A2
                                                                                                                                                            PCR primer for marker D6S967.
                                                                                                                                                                             13-JUL-1999
                                                                                                                                                                                                AAX36671;
                                                                                              Homo sapiens
                                                                                                                                                                               (first entry)
                                                                                                                                    chromosome
                           97CA-02217097
                                             98WO-CA000924.
                                                                                                                                  glaucoma allele; haplotype analysis; human; GLC1B;
me 6; GLC6p25; haplotype profile;
                                                                                                                                                                                                                   ВP
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RESULT 1716
AAX81927
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             GLC6p25 respectively. The primers are used to amplify gene sequences to generate information necessary to compile haplotype profiles. The haplotype profiles can be used to detect presymptomatic and symptomatic glaucoma. They can also be used to localise, isolate and identify the GLC1B and GLC6p25 loci so that detection of individuals with glaucoma is enhanced. The haplotype analyses also provide means for identification and following of mutant alleles in pedigrees or populations. Identification of presymptomatic individuals using the methods allows intervention in the disease process and obviates the impact of inheriting a mutant allele causing disease, by medically disrupting the initiation or progression of the disease, by medically disrupting the initiation
15-JUL-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Enzyme-specific cleavable polynucleotide substrate; quenched fluorescent moiety; biological assay; detection; identification; microorganism; sterilization assurance; nuclease; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               This sequence represents a PCR primer used in the method of the invention. The method is for detecting the presence of alleles for glaucoma comprising haphotype analysis of human chromosome 2 and 6 respectively, where the haphotypes are associated with loci GLCIB and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 18;
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                                       WO9935288-A1
                                                                                                                                           modified_base
                                                                                                                                                                                                                         modified_base
                                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAX81927 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Polynucleotide strand with amino groups.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 634 ACTCTGTCACCCAGGCTGG 652
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Page 28; 41pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 4 A; 6 C; 6 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Morissette
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                   /note=
                                                                                                                                                                                                                                                                                        /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                      Location/Qualifiers
                                                                                  /note=
                                                                                                                                                                   /note=
                                                                                                                                                                                                                                                                                                                                      " (Tb)
                                                                                                                                                                                                          /*tag=
                                                                                                                                                                                                                                                                                                                                                            note=
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                                                                                                                       *tag=
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                                                                                                                                                                                        "amine-modified
                                                                                                      "amine-modified C6
                                                                                                                                                                                                                                                                       "amine-modified C6
                                                                                                                                                                                                                                                                                                                                                         "amine-modified C6 derivative of deoxythymidine
                                                                                                                           Ω
                                                                                                                                                                                                              a
                                                                                                                                                                                                                                                                                               b
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 15.8; DB 1;
Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ָש
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                                                                                                      derivative
                                                                                                                                                                                                                                                                       derivative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
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                                                                                                                                                                                      derivative
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                                                                                                      of deoxythymidine
                                                                                                                                                                                    ō,
                                                                                                                                                                                                                                                                       of deoxythymidine
                                                                                                                                                                                    deoxythymidine
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WPI; 1999-405178/34

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RESULT 1717
AAZ01358
ID AAZ0135
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  pharmaceutical discovery, enzyme assays, immunoassays and other biological assays. The method provides a rapid and convenient approach for detection and identification of microorganisms. It can be adapted to sequence-dependent or sequence-independent tests. The invention provides improved accuracy, faster detection, and overall lower cost in detection and identification of microorganisms. The presence of nuclease is measured more accurately and sensitively by red-shifting the emission wavelength from far IV region (350-400 nm) to the 500-600 nm region of the electromagnetic spectrum and reducing the effect of background signal levels of intact reagents. The present sequence is used in the course of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        substrate bearing quenched fluorescent moieties. The enzyme-specific cleavable polynucleotide substrate is useful in biological assays for detection and identification of microorganisms, sterilization assurance,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   An enzyme-specific cleavable polynucleotide substrate bearing quenched fluorescent moieties.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 1999-419356/35.
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                                                                               22-DEC-1997;
09-SEP-1998;
                                                                                                                                                 01-JUL-1999
                                                                                                                                                                                                                                                        PG1 gene; biallelic marker; PCR primer; PG1-related biallelic marker; cancer; prostate cancer; diagnosis; therapy; prostate specific antige
                                                                                                                                                                                                                                                                                                   PCR primer for PG1 biallelic marker 4-4-187.
                                                                                                                                                                                                                                                                                                                                                         AAZ01358;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The specification describes an enzyme-specific cleavable polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 2; Page 20; 34pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        20-AUG-1998;
                         Cohen
                                                                                                                                                                           WO9932644-A2
                                                                                                                                                                                                                 Synthetic.
                                                                                                                                                                                                                                             PSA; human; ss.
                                                                                                                                                                                                                                                                                                                               27-SEP-1999
                                                                                                                                                                                                                                                                                                                                                                                  AAZ01358 standard;
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                                                                                                                     22-DEC-1998;
                                                                                                                                                                                                    Homo sapiens.
                                                    (GEST ) GENSET
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Local Similarity 89.9 nes 17; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               427
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                         Blumenfeld M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 0 A; 0 C; 0 G; 19
                                                                                                                                                                                                                                                                                                                            (first entry)
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                                                                               97US-00996306
98US-0099658P
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                                                                                                                      98WO-IB002133
                                                                                                                                                                                                                                                                                                                                                                                    DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.6%;
                          Chumakov
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           English.
                                                                                                                                                                                                                                                                                                                                                                                    ВÞ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0
                                                                                                                                                                                                                                                                                                                                                                                                                                                       19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
                         I,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             T; 0 U;
                         Bougueleret
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 19;
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RESULT 1718
AAZ61390
ID AAZ6139
XX AAZ6139
XX IP-JUN-
XX Uniform
XX Oligome
KW Oligome
KW Oligome
KW nucleas
XX Synthet
YT modifie
FT modifie
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FT modifie
FT Todifie
FT TODIFIE
XX WO2000C
XX WO2000C
XX UNIFEB
XX UNIFEB
XX VISIS-)
XX UNIFEB
XX VISIS-)
XX NANOHA1
XX MANOHA1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     at a PGI-related biallelic marker. The methods can be used to detect and to assess the risk of developing cancer or prostate cancer. Early-stage diagnosis of prostate cancer relies on prostate specific antigen (PSA) dosage. However, the effectiveness of this is limited due to its inability to discriminate between malignant and non-malignant affections of the organ. A need exists for both a reliable diagnostic procedure which would enable early-stage diagnosis, and for preventative and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to a mammalian PG1 gene and protein, and a set of PG1 biallelic markers. The PG1 polynucleotide and biallelic markers are used in a hybridisation assay, a sequencing assay, or in an allelespecific amplification assay for determining the identity of a nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       from
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              which would enable early-stage diagnosis, and for preventative and curative treatments of the disease. The PG1 gene can be used for detection of prostate cancer, and the risk of developing it in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              detection of prostate cancer, and the risk of develor future, and can also be used to determine therapies
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                                                                                                                                                                                                                                                                                                                                  Key
modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                       Oligomeric
                                                                                                                                                                                                                                                                                                                                                                                                                                                 Uniform phosphodiester oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AAZ61390 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19
                                                                                                                                                                                                                                                modified_base
                                                                                                                                                                                                                                                                                                                                                                               Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                          nuclease
                                                                                                                           17-FEB-2000
                                                                                                                                                                                                                                                                                          modified_base
              Manoharan M,
                                                                     07-AUG-1998;
                                                                                                 06-AUG-1999;
                                                                                                                                                     WO200008044-A1
                                                                                                                                                                                                         modified_base
                                           (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         10.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  TTTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Page
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   prostate cancer associated
                                                                                                                                                                                                                                                                                                                                                                                                          resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                      compound;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 0 A; 0 C; 0 G; 19 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             374;
                                           PHARM INC
               Cook PD;
                                                                       98US-00130566
                                                                                               99WO-US017895
                                                                                                                                                                                                                                                                                                /note=
17
                                                                                                                                                                               /*tag=
/note=
                                                                                                                                                                                                            /note=
19
                                                                                                                                                                                                                                     /*tag=
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                                                                                                                                                                                                                                                                note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                         2'-O-modified ribosyl nucleoside; 3' endo geometry;
phosphodiester; ss.
                                                                                                                                                                                                                                                   b
"2'-modified'
                                                                                                                                                                                                                                                                                                         a
"2'-modified
                                                                                                                                                                                                                         "2'-modified
                                                                                                                                                                               d
"2'-modified T"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    gene and biallelic markers derived
                                                                                                                                                                                                                           4
                                                                                                                                                                                                                                                                  녈
                                                                                                                                                                                                                                                                                                            님
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    for the disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0
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RESULT 1719
AAZ61404
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           nucleosides include ring structures that position the sugar moiety of the nucleosides preferentially in 3' endo geometries. The modified oligomeric compounds have increased binding affinity and increased nuclease resistance. The oligomeric compounds can be used in diagnostic,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            oligonucleotide. The specification describes containing 2'-O-modified ribosyl nucleosides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present sequence represents an uniform phosphodiester oligonucleotide. The specification describes oligomeric compounds containing 2'-0-modified ribosyl nucleosides. The 2'-0-modified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Novel 2'-O-aminoethyloxyethyl modified nucleosides and oligonucleotides used in diagnostic, therapeutic and research reagents.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               therapeutic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2000-205668/18
                                                                    Novel 2'-O-aminoethyloxyethyl modified nucleosides and oligonucleotides used in diagnostic, therapeutic and research reagents.
                                                                                                         WPI; 2000-205668/18.
                                                                                                                                                                                                       06-AUG-1999;
                                                                                                                                                                                                                                                                                                                   modified_base
                                                                                                                                                                                                                                                                                                                                                       misc_feature
                                                                                                                                                                                                                                                                                                                                                                                          Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                    nuclease resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                              Oligomeric compound;
                                                                                                                                                                                                                                                                                                                                                                                                                                                      2'-0-modified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAZ61404 standard; DNA; 19
                                            Disclosure; Page 51; 60pp; English.
                                                                                                                                Manoharan M,
                                                                                                                                                                               07-AUG-1998;
                                                                                                                                                                                                                               17-FEB-2000
                                                                                                                                                                                                                                                       WO200008044-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAZ61404
                                                                                                                                                        (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   427
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TTTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            TTTTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        вP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Page 44;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                         PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                Cook PD
                                                                                                                                                                                                                                                                                                                                                                                                                                                      ribosyl oligonucleotide with phosphodiester linkages.
                                                                                                                                                                                98US-00130566
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0 A;
                                                                                                                                                                                                        99WO-US017895
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  research reagents
                                                                                                                                                                                                                                                                                                                      16. .19
                                                                                                                                                                                                                                                                                                                                                                    Location/Qualifiers
                                                                                                                                                                                                                                                                                           /*tag= b
/note= "2'-O-[2-N,N-dimethylaminoethyl)oxyethyl-5- methyl
                                                                                                                                                                                                                                                                                                                                note= "nucleosides linked by phosphodiester linkages"
                                                                                                                                                                                                                                                                                                                                           *tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                 2'-O-modified ribosyl nucleoside;
phosphorothioate; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0 C; 0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           60pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                  ωį
                                                                                                                                                                                                                                                                                                                                                                                                                                 endo geometry;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Gaps
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The present sequence represents an oligomeric compound containing 2'-O-modified ribosyl nucleosides. The oligomeric compound contains phosphodiester linkages. The 2'-O-modified nucleosides include ring

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RESULT 1721
AAZ95241
ID AAZ9524
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AAC62422
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Best Local S
Matches 17
                                                                                                Query Match
Best Local S
Matches 17
                                                                                                                                                                         The present invention is concerned with methods of determining the nuclease stability of oligomeric compounds using capillary-gel electrophoresis and laser-induced fluorescence. The methods are us the polymerase chain reaction (FCR), molecular cloning and disease diagnosis and treatment. The present sequence was used in a demons
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   structures that position the sugar moiety of the nucleosides preferentially in 3' endo geometries. The modified oligomeric compounds have increased binding affinity and increased nuclease resistance. The oligomeric compounds can be used in diagnostic, therapeutic and research
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          molecular
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               07-FEB-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAC62422 standard; DNA;
                                                                                                                                                                                                                                                                           Determining the nuclease stability and relative binding affinity of an oligomeric compound comprises capillary gel electrophoresis using laser-
                                                                                                                                                                                                                                                                                                                                   Leeds
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    T19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         T19 diester
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AAC62422
 AAZ95241 standard; DNA; 19 BP
                                                                                                                                          Sequence 19
                                                                                                                                                                                                                                            Example 3; Col 19-20; 14pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                    20-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                        03-OCT-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                             US6127124-A.
                                                                                                                                                                                                                                                                                                                                                        (ISIS-) ISIS PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    diester;
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                                                                           427
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                           Similarity
                                                                                                                                                                                                                                                                   fluorescence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TTTTTATTTATTTTTTT 445
                                                                 er; nuclease stability assay; polymerase chain reaction; cloning; disease diagnosis; disease treatment; ss.
                                                                                                                                                                                                                                                                                                                                  Cummins
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 0
                                                                                                 Conservative
                                                                                                                                          BP; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         for use
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first
                                                                                                                                                                 of the invention
                                                                                                                                                                                                                                                                                                                                                                              99US-00234237
                                                                                                                                                                                                                                                                                                                                                                                                    99US-00234237.
                                                                                                                                          A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ۶,
                                                                                                           1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         in nuclease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0 C; 0 G; 19
                                                                                                                                          0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP.
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                                                                                                0;
                                                                                                                                          G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 15.8; D
Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               19
                                                       19
                                                                                                          Score 15.8;
Pred. No. 1.
                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        stability assay.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Ŧ;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   15.8; DB 1;
No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0 U; 0 Other;
                                                                                                           .7e+03
                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1,
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                                                                                                                     Length 19
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                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 19,
                                                                                                 0
                                                                                                                                                                             demonstration
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          <u>,,</u>
                                                                                                                                                                                                are useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gaps
                                                                                                 Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     PCR;
                                                                                                                                                                                                in
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05-JUN-2000

(first entry)

AAZ95240;

AAZ95240 standard;

DNA; 19

BP.

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RESULT 1722
AAZ95240
ID AAZ9524
XX
AC AAZ9524
XX
AC AAZ9524
XX
OT 05-JUN-
                                                                                                                                                                                                                 Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                            This sequence represents a modified oligonucleotide used in the course of the invention. The invention relates to oligonucleotides comprising nucleotides covalently linked together by internucleotide linkages where at least 1 nucleotide is linked to adjacent nucleotide by a 2',5'-internucleotide is allowed to adjacent nucleotide by a 2',5'-internucleotide in gene therapy and are also useful in antisense methodologies, diagnostics, therapeutics and as research reagents
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAZ95241;
                                                                                                                                                                                                                                                                               Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Novel modified oligonucleotides, useful in antisense methodologies, diagnostics, therapeutics and as research reagents.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 misc_RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 modified_base
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       research
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Antisense oligonucleotide; phosphorothioate; gene therapy; ISIS # 22111;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Modified oligonucleotide #3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      05-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2000-182445/16.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      13-JUL-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO200004189-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example 54; Page 59;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     14-JUL-1998;
                                                                                                                                                                                                                                 Local Similarity
                                                                                                                                                                                  427
                                                                                                                                                   Н
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       reagent; therapeutic;
                                                                                                                                                                                  TTTTTATTTTATTTTTTT
                                                                                                                                                     UTTTTTTTTTTTTTTTTT
                                                                                                                                                                                                                                                                                   BP; 0 A; 0 C; 0 G; 18 T; 1 U;
                                                                                                                                                                                                                     Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Cook PD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     98US-00115043
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      99WO-US015886
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/note= "Optionally
(2-methoxyethy1)"
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/note= "Optionally
linkages"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Location/Qualifiers
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                    75pp; English.
                                                                                                                                                                                                                                  84.2%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    "Phosphorothioate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ď
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                                                                                                                                                                                                                   Score 15.8; DB 1;
Pred. No. 1.7e+03;
1; Mismatches 2
                                                                                                                                                     19
                                                                                                                                                                                  445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      phosphorothioate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        3'-0-(2-methoxyhexyl)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       internucleotide linkage"
                                                                                                                                                                                                                                                                                   0 Other;
                                                                                                                                                                                                                                                     1,
                                                                                                                                                                                                                                                  Length
                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                                                     19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       internucleotide
                                                                                                                                                                                                                     0
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                                                                                                                                                                                                                   Gaps
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RESULT 1723
AAA06839
ID AAA0683
XX AAA0683
AC AAA0683
XX
DT 19-JUN-
XX
DE Modifie
XX
Modifie
XX
KW Modifie
KW 2'-deox
KW 2'-deox
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                                                                                                                                                                                                                              Matches
                                                                                                                                                                                                                                          Query Match
Best Local
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research r
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Modified oligonucleotide
                                                                                                                                                                                                                                                                                                                                     This sequence represents a modified oligonucleotide used in the course of the invention. The invention relates to oligonucleotides comprising nucleotides covalently linked together by internucleotide linkages where at least 1 nucleotide is linked to adjacent nucleotide by a 2',5'.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   14-JUL-1998;
                                                                                                                                                                                                                                                                             Sequence 19 BP; 0 A;
                                                                                                                                                                                                                                                                                                                                                                                                  Example 54; Page 59; 75pp;
                                                                                                                                                                                                                                                                                                                                                                                                                         diagnostics, therapeutics and as research reagents.
                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel modified oligonucleotides, useful in antisense methodologies
                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2000-182445/16.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           13-JUL-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   27-JAN-2000.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO200004189-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                modified_base
 Modified nucleoside; aminooxy group;
2'-deoxy-erythro-pentofuranosyl sugar moiety; nuclease resistant;
hybridisation; binding affinity; ss.
                                                                                                                     AAA06839 standard; DNA; 19 BP
                                                                                                                                                                                                                                                                                                               internucleotide linkage and bears a 3^7 substituent. The oligonucleotides can be used in gene therapy and are also useful in antisense
                                                  Modified T-containing oligonucleotide,
                                                                         19-JUN-2000
                                                                                                                                                                                                                                                                                                     be used in gene therapy hodologies, diagnostics,
                                                                                                                                                                                                       427
                                                                                                                                                                                                                              1 Similarity
17; Conser
                                                                                                                                                                                \vdash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             reagent; therapeutic;
                                                                                                                                                                                               TTTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       oligonucleotide;
                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             PHARM INC
                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Cook PD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   98US-00115043
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           99WO-US015886
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /*tag= c
/mod_base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /*tag= d
/note= "Optionally
linkages"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 note= "Optionally all 3'-O-(2-methoxyhexyl) or all 2'-O-
(2-methoxyethyl)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 15. .19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       *tag=
                                                                                                                                                                                                                                       1.6%;
                                                                                                                                                                                                                                                                              0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            "Phosphorothioate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     മ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                #3 ISIS # 22110.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       phosphorothicate;
                                                                                                                                                                                                                                                                                                                                                                                                    English.
                                                                                                                                                                                                                              0;
                                                                                                                                                                                                                                                                                                      therapeutics and as research
                                                                                                                                                                                 19
                                                                                                                                                                                                                                            Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                           Pred.
                                                                                                                                                                                                                              Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       , all
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       phosphorothicate internucleotide
                                                  SEQ
                                                                                                                                                                                                                                          1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             internucleotide linkage"
                                                                                                                                                                                                                                                       DB 1;
                                                   ij
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        gene therapy; ISIS # 22110;
                                                    NO:14.
                                                                                                                                                                                                                                                      Length 19;
                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                       reagents
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                                                                                                                                                                                                                                Gaps
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AAA88952
ID AAA
                                                                                                                                                                                                                                                                                                                                                                                  RESULT 1724
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     in a complementary nucleic acid strand. It also relates to coligonucleotides wherein at least some of the nucleotides are functionalised to be nuclease resistant, at least some of the nucleotides conclude a substituent that potentiates hybridisation of the coligonucleotide to a complementary strand, and at least some of the coligonucleotide to a complementary strand, and at least some of the conclude a 2'-deoxy-erythro-pentofuranosyl sugar molety. The conclude include a 2'-deoxy-erythro-pentofuranosyl sugar molety. The conclusion of one or more aminooxy moleties in such oligonucleotides corporated binding of such oligonucleotides to a complementary strand. The oligonucleotides of the invention aare used as diagnostic, concludes for research respectity, and can be used to modulate gene captession in organisms. The oligonucleotides containing the modified concleosides have increased nuclease resistance and increased binding affinity to a complementary strand. The present sequence represents an coligonucleotide containing nucleotides substituted with a 2'-O-{2- [N-(2- amino) ethyl-N-(methyl)] aminooxyethyl} group
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   protein in organisms.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        09-AUG-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WO200008042-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Κey
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic
                                                   Oligonucleotide; nuclease resistance; dermatological; cytostatic; virucide; diagnosis; DNA-RNA hybrid; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to aminooxy-modified nucleosides oligonucleotides and to oligonucleotides that elicit R
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            therapeutic and research reagents and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Aminooxy-modified nucleosides and oligonucleotides useful in diagnostic, therapeutic and research reagents and for modulating the expression of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2000-224020/19.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               07-AUG-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           17-FEB-2000.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 modified_base
Synthetic
                                                                                                                                                                                                                                                                         AAA88952;
                                                                                                                                                                                                                                                                                                                            AAA88952 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          oligonucleotides and to oligonuc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 99; Page 120; 195pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (ISIS-) ISIS PHARM INC
                                                                                                                                                                  Oligonucleotide ISIS 22115
                                                                                                                                                                                                                     05-MAR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              l Similarity
17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  \vdash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TTTTTATTTTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 0 A; 0 C; 0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cook PD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               98US-00130973
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        99WO-US017988
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Location/Qualifiers 16. .19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /*tag= a
/note= "These nucleotides are substituted with 2'-0-{2-
/note= "These nucleotides are substituted with 2'-0-{2-
[N-(2-amino)ethyl-N-(methyl)]aminooxyethyl} group"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Prakash TP,
                                                                                                                                                                                                                                                                                                                                  ΒP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Kawasaki AM;
                                                                                        psoriasis; antipsoriatic;
antibacterial; fungicide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                les and
RNase H
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     for cleavage
                                                                                        therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Gaps
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                                               Query Match
Best Local S
Matches 17
                                                                                                                                 Oligonucleotide ISIS 22115 contains a mixed phosphodiester and phosphorothioate backbone and has 2'-O-(2-methoxyethyl) chemistry. It was used in experiments to determine the effects of snake venom phosphodiesterase and liver homogenate on the stability of oligonucleotides. Novel oligonucleotides of the invention have both A-and B-form conformational geometry. The A-form geometry modulates the binding affinity and nuclease resistance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for RNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory skin conditions, skin cancers and viral, bacterial and fungal infections, and in various
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Key
modified_base
                                                                                                                                                                                                                                                                                                               New oligonucleotides containing sequences with A and B geometry, treat and diagnose e.g. psoriasis, skin cancers and viral, fungal bacterial infections, bind to single stranded RNA or DNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      misc_RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      03-MAY-2000; 2000WO-US011913.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             09-NOV-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO200066609-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        modified_base
                                                                                                 Sequence 19 BP; 0 A; 0 C; 0
                                                                                                                                                                                                                                                                                        Example 54; Page 69; 132pp; English.
                                                                                                                                                                                                                                                                                                                                                                                            Manoharan
                                                                                                                        diagnostic applications
                                                                                                                                                                                                                                                                                                                                                                                                                    (ISIS-) ISIS PHARM INC
                                                                                                                                                                                                                                                                                                                                                                    2000-672833/65.
                       427
                                                            Similarity
                 TTTTATTTTATTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                           Σ,
                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                           Mohan
                                                                                                                                                                                                                                                                                                                                                                                                                                             99US-00303586
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              /mod_base= OTHER
/note= "2'-O-(2-methoxyethyl)thymidine"
17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /*tag=
/label=
19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /*tag= d
mod_base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               "tag= c
mod_base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 '*tag= b
'mod_base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              *tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               note= "2'-0-(2-methoxyethyl)uridine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   note= "2'-0-(2-methoxyethyl)thymidine'
                                                           1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     "2'-0-(2-methoxyethyl)thymidine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      "phosphorothioate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              e
RNA
                                               0;
                                                                                                 G; 19 T; 0 U; 0 Other;
19
                                                           Score 15.8;
Pred. No. 1.
                                                 Mismatches
                                                           .7e+03
                                                                        DB 1; Length 19;
                                                 Indels
                                                 0
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Хü AAA88965 RESULT 1725

AAA88965

standard;

19 ВΡ

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427

Matches Query Match Best Local

Similarity

1.6%;

Conservative

0, 445

Pred. No. Score 15.8; Mismatches

1.7e+03 DB 1;

Length Indels

19;

0

Gaps

0;

Sequence 19

BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;

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geometry modulates the binding affinity and nuclease resistance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for RNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory skin conditions, skin cancers and viral, bacterial and fungal infections.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Oligonucleotide;
dermatological;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2'-Modified chimeric oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             05-MAR-2001
                                                                                              This sequence represents 2'-modified chimeric oligonucleotides containing 2'-modified T. The nucleotides were used to examine the effects of the modifications on nuclease resistance. Novel oligonucleotides of the invention have both A- and B-form conformational geometry. The A-form
                                                                                                                                                                                   New oligonucleotides containing sequences with A and B geometry, used treat and diagnose e.g. psoriasis, skin cancers and viral, fungal and bacterial infections, bind to single stranded RNA or DNA.
                                                                                                                                                                                                                                                             Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                 09-NOV-2000.
                                                                                                                                                                                                                                                                                                                                                                                                                                                               modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAA88965;
                                                                                                                                                             Example 86; Page 102; 132pp; English.
                                                                                                                                                                                                                                                                                                              03-MAY-1999;
                                                                                                                                                                                                                                                                                                                                       03-MAY-2000;
                        and in various
                                                                                                                                                                                                                                                                                                                                                                                         WO200066609-A1
                                                                                                                                                                                                                                                                                      (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                        2000WO-US011913
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                       PHARM INC
                                                                                                                                                                                                                                                            Mohan V;
                                                                                                                                                                                                                                                                                                                99US-00303586.
                      diagnostic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ; nuclease resistance;
cytostatic; virucide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /mod base= OTHER
/mote= "2'-modified thymidine, i.e.
/note= "2'-modified thymidine, i.e.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   /mod_base= OTHER
/note= "2'-modified thymidine, i.e.
(F), 2'-ara-(OH), -2'-ara-(OMe)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                /mod_base= OTHER
/note= "2'-modified thymidine,
/note= "2'-ara-(OH), -2'-ara-(OMe)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /mod_base= OTHER
/note= "2'-modified thymidine,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (F), 2'-ara-(OH),
                                                                                                                                                                                                                                                                                                                                                                                                                                                       Q.
                      applications
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              -2'-ara-(OMe)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                psoriasis; antipsoriatic;
antibacterial; fungicide;
                                                                                                                                                                                                                                                                                                                                                                                                                      1.e.
                                   and fungal infections,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    -S-Me,
                                                                                                                                                                                                                                                                                                                                                                                                                              -S-Me,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           -S-Me,
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                                                                                                                                                                                                                                                                                                                                                                                                                              -Me,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           -Me,
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RESULT 1726
AAA88949
Oligonucleotide ISIS 22112 contains a phosphorothioate backbone and has 3'-O-(2-methoxyethyl) chemistry. It was used in experiments to determine the effects of snake venom phosphodiesterase and liver homogenate on the stability of oligonucleotides. Novel oligonucleotides of the invention have both A- and B-form conformational geometry. The A-form geometry modulates the binding affinity and nuclease resistance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for NNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory skin conditions, skin cancers and viral, bacterial and fungal infections,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     dermatological;
diagnosis; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              05-MAR-2001
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                                                                                                                                                                                         New oligonucleotides containing sequences with A and B geometry, used treat and diagnose e.g. psoriasis, skin cancers and viral, fungal and bacterial infections, bind to single stranded RNA or DNA.
                                                                                                                                                                                                                                            WPI; 2000-672833/65.
                                                                                                                                                                                                                                                                                                                    03-MAY-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Oligonucleotide;
                                                                                                                                                                    Example
                                                                                                                                                                                                                                                                                             (ISIS-) ISIS
                        in various diagnostic
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                                                                                                                                                                     Page 69; 132pp; English.
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                                                                                                                                                                                                                                                                                              PHARM INC
                                                                                                                                                                                                                                                                   Mohan V;
                                                                                                                                                                                                                                                                                                                     9908-00303586
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ; nuclease resistance; psoriasis; antipsoriatic;
cytostatic; virucide; antibacterial; fungicide; therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ISIS 22112
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                                                                                                                                                                                                                                                                                                                                                                                                                   base= OTHER
= "3'-O-(2-methoxyethyl)thymidine"
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"3'-O-(2-methoxyethyl)thymidine"
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Sequence 19 BP; 0 A; 0 C;

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19 T; 0 U; 0 Other;

Oligonucleotide ISIS 22113 contains a phosphorothicate backbone and has 2'-O-(2-methoxyethyl) chemistry. It was used in experiments to determine the effects of snake venom phosphodiesterase and liver homogenate on the

Example

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Page 69; 132pp;

English.

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RESULT 1727
AAA88950
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Best Local S
Matches 17
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                                        New oligonucleotides containing sequences with A and B geometry, used treat and diagnose e.g. psoriasis, skin cancers and viral, fungal and bacterial infections, bind to single stranded RNA or DNA.
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                                                                                   Manoharan M,
                                                                                                  (ISIS-) ISIS
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                                                                      2000-672833/65
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                                                                                                   PHARM INC
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                                                                                    Mohan
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-O-(2-methoxyethyl)thymidine'
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Pred. No. 1
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antibacterial; fungicide; therapy;
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        stability of oligonucleotides. Novel oligonucleotides of the invention have both A- and B-form conformational geometry. The A-form geometry modulates the binding affinity and nuclease metry strance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for RNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory this confirmation of the confirmation of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 19
New oligonucleotides containing sequences with A and B geometry, u treat and diagnose e.g. psoriasis, skin cancers and viral, fungal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Oligonucleotide ISIS 22114
                                                                   WPI; 2000-672833/65.
                                                                                                                                                                                                                                         03-MAY-2000; 2000WO-US011913
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                                                                                                                                                        PHARM INC.
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                                                                                                           Mohan
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cytostatic; virucide; antibacterial; fungicide; therapy;
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/mod_base= OTHER
/note= "3'-O-(2-methoxyethyl)thymidine"
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/mod_base=
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e= "3'-O-(2-methoxyethyl)thymidine"
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"phosphorothioate linkage"
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Pred. No. 1.
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RESULT 1729
AAA88947
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Matches 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Oligonucleotide ISIS 22114 contains a mixed phosphodiester and phosphorothioate backbone and has 3'-O-(2-methoxyethyl) chemis
                                                                                                                                                                 modified_base
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                                                                                                                                                                                                                                                                                                                                                                      diagnosis;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          bacterial infections, bind to single stranded RNA or DNA
                                          03-MAY-1999;
                                                                 03-MAY-2000;
                                                                                        09-NOV-2000.
                                                                                                                                                                                                                   modified_base
                                                                                                                                                                                                                                                                                                            modified_base
                                                                                                                                                                                                                                                                                                                                                                                 dermatological;
                                                                                                               WO200066609-A1
                   (ISIS-) ISIS
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                    PHARM INC
                                                                 2000WO-US011913
                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                          99US-00303586
                                                                                                                                                                                                                                                                                                                                                                                 ; nuclease resistance;
cytostatic; virucide;
                                                                                                                                                                                                                                                                    /note=
17
                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
                                                                                                                                                                                             /mod
                                                                                                                                               mod
                                                                                                                                                                                                                                           /mod_
                                                                                                                                                             *tag=
                                                                                                                                                                                 note=
                                                                                                                                                                                                        *tag=
                                                                                                                                                                                                                               note=
                                                                                                                                                                                                                                                       *tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA; 19 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        89.5%;
                                                                                                                                                                                 _base=
:e= "3'-
                                                                                                                                   base= OTHER
== "3'-O-(2-methoxyethy1)thymidine"
                                                                                                                                                                                                                                           _base= OTHER
                                                                                                                                                                                                                                                                                         base= OTHER
                                                                                                                                                                                                                               "3'-0-(2-methoxyethyl)thymidine"
                                                                                                                                                                                                                                                                              <u>ٿ</u>
                                                                                                                                                             Q.
                                                                                                                                                                                                          ი
                                                                                                                                                                                                                                                        σ
                                                                                                                                                                                                                                                                             -O-(2-methoxyethyl)thymidine"
                                                                                                                                                                                  -O- (2-methoxyethyl) thymidine
                                                                                                                                                                                             OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           G; 19 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 15.8; D
Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      445
                                                                                                                                                                                                                                                                                                                                                                                 psoriasis; antipsoriatic;
antibacterial; fungicide; therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 chemistry.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0,
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Manoharan M,

Mohan V;

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RESULT 1730
AAA88948
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Oligonucleotide ISIS 22110 contains a phosphodiester backbone and has 3'-0-(2-methoxyethyl) chemistry. It was used in experiments to determine the effects of snake venom phosphodiesterase and liver homogenate on the stability of oligonucleotides. Novel oligonucleotides of the invention have both A- and B-form conformational geometry. The A-form geometry modulates the binding affinity and nuclease resistance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for RNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory skin conditions, skin cancers and viral, bacterial and fungal infections, and in various diagnostic applications
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New oligonucleotides containing sequences with A and B geometry, u treat and diagnose e.g. psoriasis, skin cancers and viral, fungal bacterial infections, bind to single stranded RNA or DNA.
                                                                                                                                                                                                                                                                                                                                                 Oligonucleotide; nuclease resistance; dermatological; cytostatic; virucide; diagnosis; DNA-RNA hybrid; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 19
                                                                                                                                  misc_RNA
                                                                                                                                                                                                                                 modified_base
                                                                                                                                                                                                                                                                                                                          Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                  Oligonucleotide ISIS 22111.
                                                                                                                                                                                                                                                                                                                                                                                                                           05-MAR-2001 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAA88948 standard; DNA; 19 BP.
                                                                                                                                                                                                                                                                                     modified_base
                                    WO200066609-A1
                                                                                              modified_base
                                                                                                                                                                                   modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2000-672833/65
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 427 TITTTATTTATTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         _
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 0 A; 0 C; 0 G; 19 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Page 69; 132pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                       /note=
17
                                                                                                                                                                                                                                                                                       Location/Qualifiers
                                                                                                                                                                           /*tag= b
/mod_base= OTHER
/note= "2'-0-(2-methoxyethyl)thymidine"
                                                                       /*tag=
/mod_ba
                                                                                                                                                             mod.
                                                                                                                                                                         *tag=
                                                             note=
                                                                                                            label= RNA
                                                                                                                       *tag=
                                                                                                                                               note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      89.5%;
                                                                                                                                                             base=
                                                                                                                                                                                                                                                base= OTHER
== "2'-O-(2-methoxyethyl)thymidine"
                                                                        base= OTHER
                                                                                                                                                "2'-O-(2-methoxyethyl)thymidine"
                                                           "2'-0-(2-methoxyethyl)uridine"
                                                                                     Ω
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                                                                                                                                                                         a
                                                                                                                                                             OTHER
                                                                                                                                                                                                                                                             OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 15.8; DB 1
Pred. No. 1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                               psoriasis; antipsoriatic; antibacterial; fungicide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0;
                                                                                                                                                                                                                                                                                                                                                                therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        used
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RESULT 1731
AAA71630
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     modulates the binding affinity and nuclease resistance of the oligonucleotide. The B-form geometry allows the oligonucleotide to serve as substrate for RNase-H when bound to a target nucleic acid strand. The oligonucleotides can be used to treat psoriasis and other inflammatory skin conditions, skin cancers and viral, bacterial and fungal infections,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Oligonucleotide ISIS 22111 contains a phosphodiester backbone and has 2'-
0-(2-methoxyethyl) chemistry. It was used in experiments to determine the
effects of snake venom phosphodiesterase and liver homogenate on the
stability of oligonucleotides. Novel oligonucleotides of the invention
have both A- and B-form conformational geometry. The A-form geometry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New oligonucleotides containing sequences with A and B geometry, used treat and diagnose e.g. psoriasis, skin cancers and viral, fungal and bacterial infections, bind to single stranded RNA or DNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  03-MAY-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          03-MAY-2000; 2000WO-US011913
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Example 54; Page 69; 132pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2000-672833/65
           Guzaev
                       Ravikumar
                                                                        04-FEB-1999;
09-APR-1999;
                                                                                                           06-SEP-1999;
                                                                                                                                                                                                                      modified_base
                                                                                                                                                                                                                                                            Synthetic
                                                                                                                                                                                                                                                                                     Phosphorothicate; primer; oligomer synthesis; antisense therapy; ss.
                                                                                                                                                                                                                                                                                                            Phosphorothioate 20-mer primer DNA
                                                                                                                                                                                                                                                                                                                                                                AAA71630;
                                                                                                                                                                                                                                                                                                                                                                                        AAA71630 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ISIS-)
                                                                                                                                   16-AUG-2000.
                                                                                                                                                          EP1028124-A2
                                                                                                                                                                                                                                                                                                                                       14-DEC-2000
                                                SISI (-SISI)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              in various diagnostic applications
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    l Similarity
17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           PHARM INC.
                                                PHARM INC
                                                                                                                                                                                                                                                                                                                                       (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mohan V;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    99US-00303586
                        Manoharan
                                                                        99US-0118564P.
99US-00288679.
                                                                                                             99EP-00307066
                                                                                                                                                                                                                                   Location/Qualifiers
                                                                                                                                                                                    /mod_base= OTHER
/note= "phosphorothioate linkage"
                                                                                                                                                                                                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                                                                                                                                                                                                                                                                         19
                       Z,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 15.8;
                        Capaldi DC,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  No.
                                                                                                                                                                                                                                                                                                                #1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
                          Krotz A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
                          Cole DL;
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0

Gaps

2000-500332/45

Example 2; Page 17; 33pp; English

method for the production of oligomers with reduced exocyclic ts comprises treatment with deprotecting and cleaving reagents

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   RESULT 1732
AAC62454
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               밁
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  This invention describes a novel synthetic method (M) comprising: (a) providing a sample comprising a number of oligomers of formula (I); (b) contacting the sample with a deprotecting agent to remove R t groups from the oligomers; and (c) reacting the oligomer with a cleaving reagent. The method is used to produce oligomeric compounds for use in antisense and oligonucleotide therapies. The method enables the synthesis of oligomers with a reduction in the number acrylonitrile groups attached.

Acrylonitrile has been demonstrated to be a potent carcinogen in rats. This sequence represents a phosphorothioate 20-mer primer which is used the product of the carcinogen of the carcinogen in rate.
          The present invention is concerned with the cleavage of nucleic acids from solid supports. This is carried out by adding a non-conventional nucleotide into the nucleic acid attached to the support, so that it is recognised and cleaved by a specific DNA glycosylase and the sequence is released. This is useful in many molecular biological procedures such as
                                                                                                                               Detaching nucleic acid molecule comprising unconventional nucleotide incorporated at predetermined site from a solid support involves cleaving the nucleic acid molecule at the site of unconventional nucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                07-FEB-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAC62454 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 19
                                                                                                                                                                                                                                                                                                            05-OCT-2000
                                                                                                                                                                                                                                                                                                                                                                                misc_RNA
                                                                                                                                                                                                                                                                                                                                                                                                                            Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                         nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     affinity chromatography; sequencing;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Nucleic acid cleavage; solid support; DNA-RNA hybrid;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Cleavage of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAC62454;
sequencing,
                                                                                                  Example 3; Page 34; 47pp; English.
                                                                                                                                                                                                                       (GOLD/) GOLDSBOROUGH
                                                                                                                                                                                                                                                    29-MAR-1999;
                                                                                                                                                                                                                                                                               28-MAR-2000; 2000WO-GB001190
                                                                                                                                                                                                                                                                                                                                       WO200058329-A1
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                                                                                                                                                                                          2000-664908/64.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                         acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Tritritiritiritiri
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TTTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                        purification;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first
                                                                                                                                                                                                                                                    99GB-00007245
                                                                                                                                                                                                                                                                                                                                                                                  Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                   /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   acids from solid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.6%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19
                                                                                                                                                                                                                                                                                                                                                                                                                                                         88.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       mutagenesis; DNA preparation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   supports assay oligonucleotide
   cDNA and template
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Gaps
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                36
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X A X A X U

AAF31564; AAF31564

09-APR-2001

(first

entry)

RESULT 1734 AAF31564

standard;

DNA;

19

ВP

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RESULT 1733
AAF31458
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                     δ
밁
                                           Matches
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Best Local Similarity
Matches 16; Conserv
                                                        Best
                                                                Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 based assays, mutagenesis procedures, nucleic acid purification and affinity chromatography. The present sequence is an oligonucleotide used in assays to demonstrate the methods of the invention
                                                                                                                                                                                  Guanidinium functionalized oligomers prepared from units, are hybridizable with a specific RNA or DNA diagnostic and therapeutic purposes.
                                                                                                                                                                                                                                                                                                                                                                                                                                 Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAF31458 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19 BP; 0 A; 0 C; 0 G; 18 T; 1 U; 0 Other;
                                                                                      Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                          diagnostic and investigative purposes
                                                                                                                  The present invention relates to nucleotide oligomers comprising monomer units. Oligomers modulate gene expression when hybridized by a single-organized nucleic acid. They are useful for gene therapy,
                                                                                                                                                                                                                                                                                                  07-JUL-1999;
                                                                                                                                                                                                                                                                                                                       07-JUL-2000; 2000WO-US018609
                                                                                                                                                                                                                                                                                                                                                                   WO200102423-A2
                                                                                                                                                                                                                                                                                                                                                                                       Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                            Gene expression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        10-APR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAF31458;
                                                                                                                                                               Example 26; Page 54; 108pp; English.
                                                                                                                                                                                                                                WPI; 2001-138119/14.
                                                                                                                                                                                                                                                      Manoharan M,
                                                                                                                                                                                                                                                                                                                                            11-JAN-2001.
                                                                                                                                                                                                                                                                             (ISIS-) ISIS
                                                       Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             427
                     427
                                          17;
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             TTTTTATTTTATTTTTTTT
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                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                             PHARM
                                                                                                                                                                                                                                                      Cook PD,
                                                                                                                                                                                                                                                                                                   99US-00349040
                                                                                                                                                                                                                                                                                                                                                                                                                                  SISI
                                                                                                                                                                                                                                                                                                                                                                                                            gene therapy; diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                  109989.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             84.2%;
                                                     89.5%;
                                                                 1.6%;
                                                                                                                                                                                                                                                       Prakash TP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   <u>ب</u>
                                           0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 15.8; D
Pred. No. 1.7e
1; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            445
                     445
                                                        Pred. No.
                                                                Score 15.8;
                                            Mismatches
                                                                                                                                                                                                                                                       Mohan
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.7e+03
                                                        1.7e+03
                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                             88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                        <
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2
                                                                Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                                                                                                               sequence, useful for
                                                                                                                                                                                                           corresponding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0
                                           0,
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                                           Gaps
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RESULT 1735
AAH56776
ID AAH5677
XX AAH5677
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   oligomers. The oligomers may be used as research redisease caused by undesired production of proteins treating AIDS and atherosclerosis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                undesired production atherosclerosis.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNA/RNA hybrid; oligomer; C3' methylene hydrogen phosphate; AIDS;
                                                                                                                                                                                                                                                                                                                                                           microorganism; Escherichia coli; Streptococcus pneumoniae; diagnosis; Streptococcus pyogenes; Staphylococcus aureus; Pseudomonas aeruginosa; antibacterial; antiviral; antiproliferative; antisense therapy;
                                                                                                                                                                                                                                                                                                                                                                                                            Antisense oligonucleotide; groE; microorganism; Escherichia coli;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           S. aureus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          06-SEP-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAH56776
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAH56776 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The present
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Example 46; Page 74; 110pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New oligomers for use
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2001-138117/14
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 07-JUL-1999;
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                                                                                                                                                                                                                                                                                           Staphylococcus aureus.
                                                                                                                                                                                                                                                                                                                                        microbial infection;
                                                                                                                                                                                                         25-MAY-2001
                                                                                                                                                             20-NOV-2000;
                                                                                                                                                                                                                                                    WO200136625-A2
                                                                        (GENE-) GENESENSE TECHNOLOGIES
                                                                                                                  18-NOV-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Local
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                       JA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            TTTTTATTTTATTTTTTT 445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             BP; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         invention relates to C3'
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                         Young AH,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                               2000WO-CA001347.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                              operon antisense oligonucleotide SEQ ID NO:424.
                                                                                                                  99US-0166249P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNA; 19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               G; 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 15.8;
Pred. No. 1.
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                                                                        INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
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Streptococcus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          and for (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               T; 4 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          B
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              methylene hydrogen phosphate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          , for treating disease caused by diagnosing and treating AIDS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1; Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         2
                                                                                                                                                                                                                                                                                                                                                                                                            inhibitor; growth;
pneumoniae; diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 reagents, for treating ns and for diagnosing and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0
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The present invention specifically claims AAH56368 to AAH56832 which are antisense oligonucleotides to nucleotide sequences encoding groE. More generally, antisense compounds (1) comprising antisense oligonucleotides of 5-50 bases targeted to a nucleotide sequence encoding groEL (heat shock protein (HSP)60) (GL) and groES (HSP10) (GS) gene from a microorganism, where the antisense compound is complementary to GL or GS of a microorganism and specifically hybridises with and inhibits the expression of GL or GS, is claimed. (1) have antibacterial, antiviral and antiproliferative activities, and can be used in antisense therapy and for inhibiting expression of GL or GS in cells or tissues in vitro. (1) are also useful for inhibiting the growth of a microorganism, or inhibiting the expression of GL or GS in cells or tissues in vitro. (1) are also useful for inhibiting the growth of a microorganism, or inhibiting the expression of GL or GS gene in a microorganism (a bacterial cell or a microorganism (bacterial cell or a microorganism (call or a microorganism call or a microorganism call or a microorganism call or a microorganism (call or a microorganism call or a microorganism call or a microorganism call or a microorganism (call or a microorganism call or a micro
                                                          virus) having a GL or GS gene which involves administering to the microorganism or to a cell infected with the microorganism, (I). (I) are also useful for treating a mammalian pathological condition mediated by the microorganisms which involves identifying a eukaryotic organism having a pathological condition mediated by microorganisms having a GL of GS gene and administering (I) such that the growth of microorganism is inhibited. The antisense compounds are utilised for diagnostics, therapeutics, prophylaxis and as research reagents and kits, e.g., to prevent or delay microbial infections in humans. They are also useful as molecular weight markers. AAH5632 to AAH56367 and AAH56831 to AAH56854 represent PCR primers for groß sequences which are used in the exemplification of the present invention. AAH56855 to AAH56870 represent groß nucleotide sequence given in the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel antisense compounds targeting nucleic acid encoding groEL or gene of microorganism, which hybridize with and inhibit expression genes, useful to inhibit growth of microorganism having the genes.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ψРІ; 2001-355633/37.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            3; Page 52; 110pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            English.
                                                                                                                                       represent
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Matches Query Match Best Local 604 TTATTTTTAATTTTTTGAG \vdash l Similarity 17; Conserv TTATTTCAACTTTTGAG 19 Conservative 1.6%; ٥, 622 Score 15.8; Pred. No. 1 Mismatches 1.7e+03 DB 1; <u>ب</u> Length Indels 0 Gaps 0

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Sequence

19

BP; 4 A;

2 C; 2 G; 11 T; 0 U; 0 Other;

문 AAH38442; AAH38442 standard; DNA; 19 14-AUG-2001 (first entry) ВP

SNP specific lower PCR primer SEQ ID 1238.

RESULT 1736
AAH38442
ID AAH3844
XX AAH3844
XX AAH3844
XX AAH3844
XX SNP SPE
XX SNP SPE
XX SINGle
KW Single
KW Single
KW Lesch-N
KW Polycys
KW Lesch-N
KW polycys
KW Inflamm
XX Homo sa
XX H SNPB; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia; polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; Single nucleotide polymorphism; SNP; single nucleotide primer extension; 13-OCT-2000; 26-APR-2001 WO200129262-A2 inflammation; 2000WO-US028436 forensic investigation; paternity analysis; diabetes insipidus; cancer; PCR primer; ss

15-OCT-1999;

99US-0160096P

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AAH39785/c
ID AAH397
XX
AC AAH397
AC AAH397
XX Single
XX Single
XX Single
KW Single
XX Single
XX
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        inflammation, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and paternity analysis. The present sequence represents a PCR primer specific
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Picoult-Newburg
                                                                                                                                                                                                                                                                                                                                                            SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Esch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia; polycystic kidney disease; osteogenesis imperfecta; auttoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 19 BP; 3 A; 6 C; 4 G; 6 T; 0 U; 0 Other;
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       15-OCT-1999;
                                                                       13-OCT-2000; 2000WO-US028436.
                                                                                                                                                                                                                                                                                             Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Single nucleotide polymorphism; SNP; single nucleotide primer extension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SNP specific upper PCR primer SEQ ID 2581.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       SNP containing DNA sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (first entry)
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       99US-0160096P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.8;
Pred. No. 1
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Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide CC primer extension (SNPE) primers, and the sequences of regions flanking CC sites of single nucleotide polymorphisms SNPs. The present invention CC includes kits for determining the presence or absence of a SNP, using the CC oligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by CC performing a single-nucleotide primer extension reaction. The CC oligonucleotides are useful for determining the presence or CC oligonucleotides are useful for determining the presence, absence or CC identity of a SNP and for genotyping nucleic acid samples by association analysis the genotype of an individual or group of CC individuals, having a pathological phenotypic trait suspected of being CC aussed by one or more SNPs. Phenotypic traits include diseases e.g. CC agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CC osteogenesis imperfecta and acute intermittent polycystic kidney disease, CC osteogenesis imperfecta and acute intermittent polycystic benotypic traits also include symptoms of or may be genetic such as autoimmune CC disease of which a component is or may be genetic such as autoimmune CC inflammation. Cancer, nervous system diseases and inferrion by narhoranic conference pervous system diseases and inferrio
inflammation, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and paternity analysis. The present sequence represents a PCR primer specific for a human SNP containing DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 1; Page 63; 83pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         acid sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New genotyping oligonucleotide, useful for detecting the presence,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (ORCH-) ORCHID BIOSCIENCES INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Pohl M;
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Query Match Best Local Similarity Sequence 19 BP; 6 A; 89.5%; 6 C; 4 G; 3 T; 0 U; 0 Other; Score 15.8; Pred. No. 1. .7e+03 DB 1; Length 19;

Ś 1089 GGCGGGGTTTCACCATATT 1107 19 GACGGGGTTTCACCATGTT 1

Matches

Conservative

0;

Mismatches

Indels

0

Gaps

0

RESULT 1738 AAH40317/c AAH40317 standard; DNA; 19 AAH40317;

SNP specific upper 14-AUG-2001

PCR primer SEQ ID 3113.

(first entry)

single nucleotide polymorphism; SNP; single nucleotide primer extension; SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia; polycystic kidney disease; osteogenesis stic kidney disease; osteogenesis imperfecta; autoimmune disease; intermittent porphyria; rheumatoid arthritis; multiple sclerosis; investigation;

26-APR-2001.

13-OCT-2000; 2000WO-US028436.

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CC includes kits for determining the presence of a SNP, using the CC oligonucleotides of the invention. The PCR primers are used to amplify a CC system of the control of the primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by coligonucleotides are useful for genotyping a nucleic acid sample by coligonucleotides are useful for determining the presence, absence or coligonucleotides are useful for determining the presence, absence or coligonucleotides are useful for determining the presence, absence or coligonucleotides are useful for determining the presence, absence or coligonucleotides are useful for determining the presence, absence or coligonucleotides and for genotyping nucleic acid samples, for e.g. to assess by association analysis the genotype of an individual or group of coligonucleotides, having a pathological phenotypic trait suspected of being caused by one or more SNPs. Phenotypic traits include diseases e.g. coligonum algoritis and acute intermittent porphyria. Phenotypic constends and acute intermittent porphyria. Phenotypic constends also include symptoms of or susceptibility to multifactorial coliseases of which a component is or may be genetic such as autoimmune confidence, nearous system diseases and infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic confidence, nervous system diseases and infection and pathonism and confidence in the present sequence represents a PCR primer specific for a human SNP containing NNA segmence.
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                                                                                                                                                                                                                                                                                                                                                                                                   AAH46460
                                                                                                                                                                                                                                                                                                                                                                                                                   RESULT 1739
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking sites of single nucleotide polymorphisms SNPs. The present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2001-290930/30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               15-OCT-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 1; Page 65; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Picoult-Newburg L,
                                                                                                                                                                                                                                                                      Oligonucleotide
                                                                                                                                                                                                                                                                                                          14-SEP-2001
                                                                                                                                                                                                                                                                                                                                                                                AAH46460 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (ORCH-) ORCHID BIOSCIENCES INC.
                                                                                                                                                                                                Synthetic
                                                                                                                                                                                                                                  Phosphorothioate;
                                                                  modified_base
                                                                                                                                          modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              674
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CTTACTGCAACCTCCGCCT 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 CTCACTGCAACCTCTGCCT 692
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 5 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SNP containing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                          (first
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                                                                                                                                                             Location/Qualifiers
                                                     /*tag=
                   /note=
                                                                                       'note= "All bases are phosphorothioate"
                                                                                                                                                                                                                                    anti-viral therapy; stereochemical pathway; ss
                                                                                                                                                                                                                                                                                                          entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          2 C; 9 G; 3 T; 0 U; 0 Other,
                 base= OTHER
e= "Modified with
                                                                                                            base=
                                                                                                                                                                                                                                                                                                                                                                                    ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DNA sequence
                                                                                                            OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                    2'-O-methoxyethyl"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0
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RESULT 1740
AAH25737
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention relates to a method for preparing phosphorothioate oligonucleotides having at least one nucleoside with a 2' modification. The method comprises phosphitylating the 5'-hydroxyl of a nucleic acid group having at least one nucleoside with a 2' modification in an acetonitrile. The present sequence was used to illustrate the method of the present invention. The method is useful for synthesising sulphurised 2' substituted phosphorothioate oligonucleotides, which may be used in molecular biological research, in applications such as anti-viral therapy, and for determining the stereochemical pathways of certain enzymes which recognise nucleic acids
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Preparing sulfurized 2' substituted phosphorothioate oligonuclectides useful in biological research, comprises phosphitylating the 5'-hydroj of a nucleic acid having a nucleoside with a 2' modification.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Cole DL, Ravikumar VT,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        US6242591-B1
                                                                                                                                                                                                                                      gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example 12; Col 7; 7pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              15-OCT-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       11-JAN-2000; 2000US-00481486
                                                                                                                                                                                                            Synthetic.
                                                                                                                                                                                                                                                    Human; RNase
                                                                                                                                                                                                                                                                             Human type
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (ISIS-) ISIS PHARM INC
                                                  WO200123613-A1
                                                                                                                                                                        modified_base
                                                                                                                                                                                                                                                                                                      14-AUG-2001
                                                                                                                                                                                                                                                                                                                               AAH25737;
                                                                                                                                                                                                                                                                                                                                                        AAH25737 standard; DNA; 19
                                                                                                                        modified_base
                                                                                                                                                                                                                                    n; RNase H type II; RNase H1 cleavage substrate; therapy; primer; phosphorothioate backbone; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                              427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     l Similarity
17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                      ب
                                                                                                                                                                                                                                                                                                                                                                                                                                          TTTTATTTATTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                         TTTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                           II RNase H substrate oligonucleotide #4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 0 A; 0 C; 0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               97US-00950779
                                                                                                                          16. .19
                                                                                                                                                                                      Location/Qualifiers
                                                                        /mod_base= OTHER
/note= "optionally
methoxyethyl)"
                                                                                                                                   note=
                                                                                                                                                  mod_base= OTHER
                                                                                                                                                           *tag= a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                     "optionally
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Cheruvallath
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Mismatches
                                                                                                                                      phosphorothioate backbone
                                                                                       3'-0-(2-methoxyethyl) or 2'-0-(2-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ZS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Indels
                                                                                                                                                                                                                                                      antisense therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 5'-hydroxyl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Gaps
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29-SEP-2000; 2000WO-US026729

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RESULT 1741
AAH25738
ID AAH2573
XX AAH2573
XX AAH2573
XX Human t
XX Human t
XX Human t
XX Gene tl
XX Gene tl
XX Gene tl
XX FT modific
FT modific
FT misc_R
FT misc_R
FT W02001
XX W02001
XX W02001
XX PP 29-SEP
XX 1SIS-
PN (ISIS-
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Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human type II RNase H substrate oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention provides a number of DNA-RNA oligonuclectides which can act as substrates for human RNase HI (a type II RNase). The sequence consists of two portions, one of which is capable of supporting cleavage of a complementary target RNA and the other of which is incapable of supporting such cleavage. These can be used to enhance the effectiveness of antisense therapies. The present sequence is an RNase H substrate used in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Crooke
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             30-SEP-1999;
                                    Crooke ST,
                                                                                                                                                                                                                                                                                                                                                                                                                     misc_RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human; RNase H type II; RNase H1 cleavage substrate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      14-AUG-2001
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                                                                                                                                                     30-SEP-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                AAH25738
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAH25738 standard;
                                                                                                                                                                                                                                                                         05-APR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  modified_base
                                                                                              (ISIS-) ISIS PHARM INC
                                                                                                                                                                                                            29-SEP-2000; 2000WO-US026729
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2001-343164/36
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          427 TITITATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ST,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ISIS PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TTTTTTTTTTTTTTTT 19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Lima WF,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                    Lima WF,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 primer; phosphorothioate backbone; ss
                                                                                                                                                                                                                                                                                                                                                                                                                  /mod_base= OTHER /
/note= "optionally 3
methoxyethyl)"
19
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16. .19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         "optionally phosphorothioate backbone"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Manoharan
                                    Manoharan M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  15.8;
No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            3'-0-(2-methoxyethyl) or 2'-0-(2-
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RESULT 1742
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Matches
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             of a complementary target RNA and the other of which is incapable of supporting such cleavage. These can be used to enhance the effectiveness of antisense therapies. The present sequence is an RNASE H substrate used in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The present invention provides a number of DNA-RNA oligonucleotides which can act as substrates for human RNase HI (a type II RNase). The sequence consists of two portions, one of which is capable of supporting cleavage of a complementary target RNA and the other of which is incapable of
                                                        patient sample. identification of the development o
                                                                                 PCR primers AAC62163-64 were used to amplify a human apolipoprotein CI (APOCI) allele. The primers are used in the method of the invention. The specification describes a method for screening for a genetic factor for having an enhanced risk of developing Alzheimer's disease. The method comprises amplifying the genomic DNA encoding an APOCI region in a patient sample. The method is useful for early screening or identification of Alzheimer's disease, and for monitoring the presence of identification of Alzheimer's disease, and for monitoring the presence of
                                                                                                                                                                                                                                                                                                                                                                                   Screening for a genetic factor for having an enhanced risk of developing Alzheimer's disease (AD), useful for identifying and monitoring the presence or development of AD, by amplifying the DNA encoding an apolipoprotein CI region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAC62164 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19 BP; 0 A; 0 C; 0 G; 18 T; 1 U;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Chimeric oligonucleotides that can serve as substrates for human RNase H1, useful for enhancing the effectiveness of antisense gene therapies.
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Sequence
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                                                                                                                                                                                                                                                                                                                                 Example 8; Col 18; 21pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            PCR primer used to amplify a human APOCI allele fragment
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   PCR primers AAC62165-66 were used to amplify a human apolipoprotein CI (APOCI) allele. The primers are used in the method of the invention. The specification describes a method for screening for a genetic factor for having an enhanced risk of developing Alzheimer's disease. The method comprises amplifying the genomic DNA encoding an APOCI region in a patient sample. The method is useful for early screening or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Screening for a genetic factor for having an enhanced risk of developing Alzheimer's disease (AD), useful for identifying and monitoring the presence or development of AD, by amplifying the DNA encoding an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAC62165 standard;
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Pred. No. 1.7e
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; MDR-1; multi drug resistance-1; drug uptake; disease; cancer; inflammatory disease; neuronal disease; CNS disease; cardiovascular disease; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New polynucleotide encoding a molecular variant Multi Drug Resistance (MDR)-1 polypeptide is useful for diagnosing and treating diseases associated with abnormal MDR-1 expression or function, e.g. cancer.
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22-FEB-2000; 2000EP-00103361.
                                                                                                                                                                                                                                 Human; MDR-1; multi drug resistance-1; drug inflammatory disease; neuronal disease; CNS cardiovascular disease; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Brinkmann U,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            28-JUL-2000; 2000WO-EP007314
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Homo sapiens.
                                                                                       28-JUL-2000; 2000WO-EP007314
                                                                                                                                                                                                                                                                                                           Human multi drug resistance-1
                                                                                                                                                                                                                                                                                                                                                 04-MAY-2001
                                                                                                                                                                                                                                                                                                                                                                                    AAF91127;
                                                                                                                                                                                                                                                                                                                                                                                                                          AAF91127 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 sensitivity interfering resulting from po-
lead to difficulties in treating cancer,
inflammatory and CNS diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The
the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 1; Page 121; 154pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2001-159855/16
                                  30-JUL-1999;
22-FEB-2000;
                                                                                                                                                              WO200109183-A2
                                                                                                                                                                                                Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      the human multi drug resistance-1 (MDR-1) protein. These can be identify compounds capable of treating multidrug resistance and sensitivity interfering resulting from polymorphisms in MDR-1, versulting the polymorphisms in work.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (EPID-) EPIDAUROS BIOTECHNOLOGIE
(EPID-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        present inve
human multi
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EPIDAUROS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           invention provides nucleotides encoding molecular variants
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                                    2000EP-00103361
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                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                       99EP-00114938
 BIOTECHNOLOGIE
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.6%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                             gene related sequence SEQ ID NO:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               5 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DB 1;
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                                                                                                                                                                                                                                                        j uptake;
i disease;
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                                                                                                                                                                                                                                                                             disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          neuronal,
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                                                                                                                                                                                                                                                                                                                   214.
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention provides nucleotides encoding molecular variable human multi drug resistance-1 (MDR-1) protein. These can be usudentify compounds capable of treating multidrug resistance and sensitivity interfering resulting from polymorphisms in MDR-1, whiled to difficulties in treating cancer, cardiovascular, neuronal, inflammatory and CNS diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New polynucleotide encoding a molecular variant Multi Drug Resistance (MDR)-1 polypeptide is useful for diagnosing and treating diseases associated with abnormal MDR-1 expression or function, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI;
                                                                      oligonucleotides which have en hybridization properties than
                                                                                                                                                                                                                                                                                                                                                          2'-O-acetamido; diagnostic; kinase modulator; nuclease resistance;
tumour formation; cancer; protein kinase C expression;
cell adhesion molecule expression; multidrug resistance; ss.
                                                                                                                                                                                                                                                                                                       modified_base
                                                                                                                                                                                                                                                                                                                                      Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                            02-MAR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAC83664 standard;
                                                                                              New 2'-O-acetamido modified nucleosides (I) used to produce
                                                                                                                                                                                  19-AUG-1999;
                                                                                                                                                                                                        19-AUG-1999;
                                                                                                                                                                                                                              14-NOV-2000
                                                                                                                                                                                                                                                   US6147200-A
                                                                                                                                                                                                                                                                                                                                                                                                      2'-O-N-[2-(dimethylamino)ethylacetamido]-modified
                                                                                                                                                              (ISIS-) ISIS
                                                                                                                   2001-069824/08.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               832 CTTGTGATCTGCCTGCCTC 850
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   17;
                                                    12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Page 121; 154pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 5 A; 4 C; 9 G; 1 T; 0 U; 0 Other;
                                                    65
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                               PHARM INC
                                                                                                                                         Cook
                                                                                                                                                                                  9905-00378568
                                                                                                                                                                                                        9908-00378568
                                                    28;
                                                                                                                                                                                                                                                                                 /*tag=
/mod_ba
                                                                                                                                                                                                                                                                                                      Location/Qualifiers
                                                                                                                                                                                                                                                                     /mod_base= OTHER
/note= "2'-O-N-[2-(dimethylamino)ethylacetamido]5MeU"
                                                                                                                                      PD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA;
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                                                 29pp;
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                                                                                                                                         Fraser
                                                  English.
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                                                                                  enhanced
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 15.8;
Pred. No. 1.
                                                                        prior
                                                                                                                                       AS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                         art.
                                                                                                                                         Prakash
                                                                                   nuclease
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                       TP,
                                                                                   resistance
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length 19;
                                                                                                                                         Kawasaki
                                                                                                                                                                                                                                                                                                                                                                                                     oligo ISIS #32335.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
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                                                                                  and
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
                                                                                  superior
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            be used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         which can
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Gaps
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The present sequence is a modified oligonucleotide. 2'-O-acetamic modified nucleosides were used to produce oligonucleotides which enhanced nuclease resistance and superior hybridisation properties.

leotides which have ation properties that identification or

2'-0-acetamido-

The present invention relates to a method for the qualitative and quantitative detection of targets in a sample by molecular interact between the target and probes in an array. The method can be used detect interactions between nucleic acids, antigens and antibodien

receptor and ligands,

particularly

c acids, antigens in applications s

such

35 antibodies medical

interaction

used

or S

Example

Page 47;

92pp;

German

compounds

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AAK98526
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    modulating the activity of an ribonucleic acid or deoxyribonucleic acid molecule. They have a modified nucleoside monomer and are specifically hybridisable with a preselected nucleotide sequence of a single-stranded or double-stranded target deoxyribonucleic acid or ribonucleic acid molecule. The oligomers are further useful in a ras-luciferase fusion system using ras-luciferase transactivation. They are useful in abnormal cell proliferation and tumour formation and modulation of expression of protein kinase C and cell adhesion molecules such as ICAM. They are useful in the modulation of proteins related to multidrug resistance and viral genomic nucleic acids such as HOV, herpes viruses, Epstein-Barr virus, cytomegalovirus, papillomavirus, hepatitis C virus and influenza
                                                                                                                                                                   Bickel
Schulz
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence
                                                                                                                                                                                                                                                                                                                                                             modified_base
                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                        genotyping;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Nucleic acid quantitative analysis related oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAK98526;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         quantification of ribonucleic acid and deoxyribonucleic acid or
                                                                                                        Determining targets diagnosis, based on
                                                                                                                                           WPI; 2002-154760/20
                                                                                                                                                                                                                              01-JUL-2000; 2000DE-01033334.
                                                                                                                                                                                                                                                     02-JUL-2001; 2001WO-EP007575
                                                                                                                                                                                                                                                                                                     WO200202810-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                    Target detection; quantitative analysis; probe; medical diagnosis;
forensics; bacterial screening; tissue typing; gene expression analysis;
                                                                                                                                                                                                                                                                             10-JAN-2002.
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17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                standard;
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                                                                                                                                                                 Ehricht R, Wagner G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      B₽;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
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/mod_base= OTHER
/note= "modified k
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0 A;
                                                                                                                                                                                                                                                                                                                                                                         Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA;
                                                                                                      by interaction with detecting formation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.6%;
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Pred. No. 1.7e
0; Mismatches
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                                                                                                        obe array, useful e.g. fo
precipitate at specific
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Matches 17; Conserv
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Best Local :
Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         diagnosis, forensic science, bacterial screening, tissue typing for transplantation, monitoring gene expression, and genotyping. The presequence is a modifying oligonucleotide used in the exemplification
                                                                             The present invention relates to methods for distinguishing between individuals homozygous for and therefore afflicted with Van Buchem's disease, individuals heterozygous for and therefore carriers of Van Buchem's disease and individuals who are not afflicted with Van Buchem's disease comprise identifying a large genomic deletion in chromosome 17 at 17q21. The method is useful for identifying individuals who are afflicted with or carriers of diseases associated with one or more genomic deletion, particularly Van Buchem's disease, which is a rare autosomal recessive disorder that results in a bone dysplasia referred to a craniotubular hypertosis. The present sequence is a PCR primer used to amplify 92Kb gene fragment in human chromosome 17 at 17q21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 19 BP; 0
                                                                                                                                                                                                                                                                          Methods for identifying subjects who are afflicted with or carriers of diseases associated with genomic deletion(s), e.g. Van Buchem's disease, by determining the presence of a deletion in the 92 kb region of human chromosome 17 at 17q21.
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06-JUL-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human; Van Buchem's disease; genomic deletion; craniotubular hypertosis; autosomal recessive disorder; chromosome 17; chromosome 17q21;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               bone dysplasia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human chromosome 17 92Kb gene fragment amplifying PCR primer, Wt2R
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               31-MAY-2002
                                                                                                                                                                                                                                                Example 3; Page 26; 109pp; English
                                                                                                                                                                                                                                                                                                                                             WPI; 2002-227089/28
                                                                                                                                                                                                                                                                                                                                                                                                   (CELL-)
                                                       Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               invention
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STRAEHLING HAMPTON K.
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                                                       B₽;
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2001US-0303386P
                                                                                                                                                                                                                                                                                                                                                                          Proll S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2001WO-US023968
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              1.6%;
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Pred. No. 1
                  Score 15.8;
Pred. No. 1
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                                                         5 T;
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    Mismatches
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U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.7e+03;
                 .7e+03
                                                         0 Other;
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cation of
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CC The present sequence is that of a chimeric oligonucleotide having some 2' cc -methyl thioethyl modifications. This was compared with oligonucleotides CC with methoxyethoxy (see ABA91950) and dimethylaminopropyl (see ABA91951) cc modifications for resistance to snake venom phosphodiseterase. The assay revealed the nuclease resistance of the modified oligomers. The invention CC provides methods for the alkylation of alcohols, amines, thiols and their CC derivatives by cyclic sulfate intermediates. In particular, methods for the alkylation of the 2', 3' or 5'-hydroxy position of nucleosides and CC their analogues with cyclic sulfates to form the 2', 3' or 5'-O-alkyl CC sulfate modified compounds are disclosed. Displacement of the 2', 3' or 5'-O-sulfate with a nucleophile provides 2', 3' or 5'-O-modified CC nucleosides and their analogues. The methods are especially useful for CC the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates that are precursors for the preparation of oligomeric cc compounds useful as therapeutics, diagnostics and research reagents

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ABA91949
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Synthetic
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                                                                                 WPI;
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                          Alkylation of alcohols, amines, nucleosides that are precursors beneficial as therapeutics, invo
                                                                                                                                                                     20-AUG-1999;
                                                                                                                                                                                               20-AUG-1999;
                                                                                                                                                                                                                            21-AUG-2001.
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15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   oligonucleotide; nuclease resistance; diagnosis;
                                                                                                               Manoharan
Col 35; 45pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                     99US-00378665
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/mod_base=
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/mod_base= OTHER
/note= "2'-methyl thioethyl thymidine'
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                          nes, or thiols, useful for preparing sors for preparation of oligomeric compounds involves use of cyclic sulfate intermediates
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                                                                                                                                                                                                                                                                                                                                          thioethyl thymidine'
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SQ

Sequence

19

BP; 0 A;

0 C; 0 G; 19

T; 0 U; 0 Other;

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The present sequence is that of a chimeric oligonucleotide having some 2' -dimethylaminopropyl modifications. This was compared with oligonucleotides with methyl thioethyl (see ABA91949) and methoxyethoxy (see ABA91950) modifications for resistance to snake venom phosphodiesterase. The assay revealed the nuclease resistance of the modified oligomers. The invention provides methods for the alkylation of alcohols, amines, thiols and their derivatives by cyclic sulfate intermediates. In particular, methods for the alkylation of the 2', 3' or 5'-bydroxy position of nucleosides and their analogues with cyclic sulfates to form the 2', 3' or 5'-O-alkyl sulfate modified compounds are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Dimethylaminopropyl modified oligonucleotide
                                                                                                                                                Alkylation of alcohols, amines, or thiols, useful for preparing nucleosides that are precursors for preparation of oligomeric compounds beneficial as therapeutics, involves use of cyclic sulfate intermediates
                                                                                                                                                                                                                                                                                                                                    US6277982-B1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2'-0-alkyl oligonucleotide; nuclease resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  23-MAY-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ABA91951;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ABA91951 standard;
                                                                                                                                                                                                                                                                                        20-AUG-1999;
                                                                                                                                                                                                                                                                                                              21-AUG-2001
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                                                                                                                            Example 15; Col 35;
                                                                                                                                                                                                                                            (ISIS-) ISIS PHARM INC.
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17; Conserv
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                                                                                                                                                                                                                                                                                                                                                        _base= OTHER
== "2'-dimethylaminopropyl thymidine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                              base=
                                                                                                                                                                                                                    Z
                                                                                                                                                                                                                                                                                                                                                                                                                                           ise= OTHER
"2'-dimethylaminopropyl thymidine"
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Pred. No. 1.
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                                                                                                                                                                                                                    Kawasaki
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      diagnosis; therapy;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 disclosed. Displacement of the 2', 3' or 5'-0-sulfate with a nucleophile provides 2', 3' or 5'-0-modified not be methods are especially useful for the preparation of 2'-0-alkyl nucleotides, nucleosides and nucleoside surrogates that are precursors for the preparation of oligomeric compounds useful as therapeutics,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence
                                                  Alkylation of alcohols, amines, or thiols, useful for preparing nucleosides that are precursors for preparation of oligomeric cobeneficial as therapeutics, involves use of cyclic sulfate interpretations.
                                                                                                                                                                                                                                                                       modified_base
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                                                                                                                                                                                                                                                                                                                                                                      Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                        2'-0-alkyl oligonucleotide;
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                                                                                                                                                         20-AUG-1999;
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                                                                                     WPI; 2002-235143/29.
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                                                                                                                        (ISIS-) ISIS
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                                                                                                       Manoharan
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                                                                                                                                                                                                                                                                                          OTHER
                                                                                                                                                                                                                                                                                                                                                                                        nuclease resistance; diagnosis; therapy;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 15.8;
Pred. No. 1.
                                                                                                       PD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                      Jung
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.7e+03;
2;
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                                                                                                                                                                                                                                                thymidine"
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The present sequence is that of a chimeric oligonucleotide having somethoxyethoxy modifications. This was compared with oligonucleotides with methyl thioethyl (see ABA91949) and dimethylaminopropyl (see

Example 15;

Col 35; 45pp; English.

intermediates

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compounds

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RESULT 1752
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ID ABK9442
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AC ABK9442
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AC ABK9442
XX
DT 27-AUG-
DT 27-AUG-
DX Human 1
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HUMAN 1
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                                                                                                        The invention relates to detecting mutations in the BRCA1 and hMLH1 gene comprising subjecting a set of amplification products to two-dimensional DNA electrophoresis (TGDS) to produce a characteristic spot pattern for specific mutation in either the BRCA1 or the hMLH1 gene. Also included are test kits for enabling BRCA1 or hMLH1 gene thesting comprising short PCR primers given in the specification, mixed in 20 mM of Tris-HCl, 50 mL C1, 25 micro M of dNTP, and 5 % formamide. The method is useful for KC1, 25 micro M of dNTP, and 5 % formamide. The method is useful for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Detecting mutations in the BRCA1 and hMLH1 gene comprises subjecting amplification products to 2-dimensional gel electrophoresis to produce characteristic spot pattern for a specific mutation in either the BRCA1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         hMLH1; DNA mismatch repair; BRCA1; ss; PCR; primer; BRCA1; breast and ovarian cancer susceptibility gene; TGDS; human; two-dimensional DNA electrophoresis; tumour suppressor gene;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human MLH1 DNA mismatch repair gene,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      27-AUG-2002 (first entry)
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                                    detecting mutations in the BRCA1 (breast and ovarian cancer susceptibility gene, a tumour suppressor gene) and hMLH1 gene (a DNA
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17; Conserv
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Pred. No. 1.
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The present sequence is a PCR primer specific

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RESULT 1753
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      The present invention describes a method for detecting a nucleic acid probe, which comprises using chain extending enzymes to elongate probes. The method comprises: (a) treating the sample with a chain terminating reagent to prevent polynucleotide chain growth from the nucleic acid in the sample; (b) contacting the sample with the probe containing a terminus capable of elongation by a chain extending enzyme, where the probe hybridises to the nucleic acid in the sample; (c) contacting the sample with a chain extending enzyme and its substrates, which elongates the probe; and (d) detecting the elongated hybridised probe. Also described is a method comprising: (a) treating nucleic acid molecules or modified nucleic acids in a sample with a reagent or reagents that render the nucleic acid chains unextendable by a non-template-dependent enzyme; (b) hybridising the treated molecules with a nucleic acid grobe that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 19
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25-MAY-2000;
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                                                                                                                                                                                             Example 1; Page 5; 10pp;
                                                                                                                                                                                                                                                Identifying and detecting nucleic acids,
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                                                                                                                                                                                                                                                                                                       Tullis
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17; Conser
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                                                                                                                                                                                                                      involves employing chain extending enzymes (e.g. telomerase) e probes to render them readily detectable.
                                                                                                                                                                                                                                                                                                                                 TULLIS R H. STREIFEL J
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         action; tailed primer; primer; probe; identification;
linear amplification scheme; chain extending enzyme;
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Pred. No. 1
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         The present sequence is that of single nucleotide polymorphism (SNP)
CC primer MPO-R. This primer was used in a multiplex endpoint SNP analysis
CC as an example of the use of novel non-fluorescent asymmetric cyanide dye
CC compounds of the invention as quenching reporter dyes. A 7-colour
CC compounds of the fluorogenic PCR 5-nuclease, or Tagman, assay. The test
CC system was a set of 3 SNPs, denoted MPO, BAK and LIG. Bach SNP system
CC consisted of 2 primers (see ABA91959-74) and 2 sequence-specific probes
CC (see ABA91975-80) consisting of a novel non-fluorescent quencher,
CC (nitrothiazole blue, at the 3' end, and 6 different reporter dyes (6-FAM,
CC dR110, dR6G, dTMR, DROX and JAZ) at the 5' end. The 7th colour was from
CC aluminium phthalocyanine tetrasulfonate, used as a passive reference.
CC rollowing PCR, the reactions were measured on a luminescence spectrometer
CC in synchronous scanning mode. The spectral overlap in the set was
CC evaluated by calculation of the conditioning number of the 7x7 matrix
CC (dye fluorescence versus wavelength). The small value of the condition
CC number (1.5) proved that crosstalk between the dyes was minimal. SNP
CC genomic DNA (from human blood samples and Raji (ATCC CCL-86) cells) were
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ABA91970
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                    New non-fluorescent asymmetric cyanide dye compounds, quenching reporter dyes in nucleic acid hybridization fluorescence energy transfer as means of detection.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (c) treating any hybrids formed with a non-template dependent chain elongating enzyme and its substrates, where any hybridised probe is extended. The method is useful for identifying and detecting nucleic acids, particularly DNA hybridisation probes. The present sequence represents a tailing reaction exemplary primer, which is used in an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Single nucleotide polymorphism; SNP; detection; Taqman; assay; quencher; hybridisation; human; PCR; primer; ss.
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Pred. No. 1.7e+03;
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Best Local
                      The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19 BP; 3 A; 5 C; 7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     plots. The multiplex PCR system provides increased potential cost savings
                                                                                                                                                                                                  Alkylating 2' position of 2',3'-dihydroxy sugar molety of nucleoside for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisation affinity; nuclear resistance; alkylation; therapeutic; diagnostic; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAD42000;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                AAD42000
                                                                                                                                                                                                                                                                                                  Kawasaki
                                                                                                                                                                                                                                                                                                                                                       08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                 08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Key
                                                                                                                                                                         Example 46; Col 31; 24pp; English.
                                                                                                                                                                                                                                                                        WPI; 2002-546338/58.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       modified_base
                                                                                                                                                                                                                                                                                                                            (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   204 GGTCAGGCTGGTCTCGAAC 222
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   GGCCAGGCTGGTCTTGAAC 19
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                                                                                                                                                                                                                                                                                                                            PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                  Fraser AS,
                                                                                                                                                                                                                                                                                                                                                        99US-00227782
                                                                                                                                                                                                                                                                                                                                                                                 99US-00227782
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                #3 used to illustrate the method of the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                note= "2'-methoxyethoxy (MOE) residues"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      89.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             עם
                                                                                                                                                                                                                                                                                                 Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 В₽
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.7e+03
                                                                                                                                                                                                                                                                                                  Cook PD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length
                                                                                                                                                                                                                                                                                                  Prakash
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                                                                                                                                                                                                                                                                                                    TP;
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Query Match
Best Local Similarity
Matches 17; Conserv

Conservative

<u>,</u>

Mismatches

Indels

<u>.</u>

Gaps

0

89.

55.6

Score 15.8; Pred. No. 1

.7e+03

DB 1; ν --

Length

Sequence

19

BP;

0

A;

0 C; 0 G;

19 T; 0 U; 0 Other;

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RESULT 1757
AAD42004
ID AAD4200
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AAD42002
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                                                                                          S
                                                                                                                   Query Match
Best Local S
Matches 17
                                                                                                                                                                                       The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAD42002
                                                                                                                                                                                                                                                                                                                                                                                 Alkylating 2'
                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2002-546338/58.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-JAN-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Dihydroxy sugar moiety; 2'-0-alkyl nucleotide; hybridisation affinity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                       Example 46; Col 33; 24pp; English.
             AAD42004 standard;
                                                                                                                                                                                                                                                                                                                                                          ylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside preparation of 2'-O-alkylated compounds comprises dissolving leoside in aprotic solvent, cooling, treating with base, warming,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       427
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                                                                                                                   1 Similarity
17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            resistance; alkylation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     standard; DNA;
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                                                                                    TTTTTATTTTATTTTTTT 445
                                                                                                                                                                 19
                                                                                                                                                                                                                                                                                                                                                reacting with
                                                                                                                                                                 BP; 0
                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                          PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              #5
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                                                                                                                                                                 A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              used to illustrate the method of the invention.
             DNA;
                                                                                                                               1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                  AS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           base= OTHER
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      19
             19
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             ВP
                                                                                                                   0
                                                                                                                                                                 G; 19 T; 0 U; 0 Other;
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                                                                                                                               Score
Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            therapeutic; diagnostic; ss.
                                                                                                                      Mismatches
                                                                                                                               . No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               2'-methoxyethyl residues"
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                                                                                                                                                                                                                                                                                                                                                                                                                                   Cook
                                                                                                                               DB 1;
.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                   PD,
                                                                                                                                          Length
                                                                                                                     Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                   Prakash
                                                                                                                                                                                                                                                                                                                                                                                                                                   TP,
                                                                                                                     0
                                                                                                                     Gaps
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0

AAD42010 standard; DNA; 19

쁌

04-NOV-2002 AAD42010;

(first

entry)

Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisation affinity; nuclear resistance; alkylation; therapeutic; diagnostic; ss. Oligonucleotide #13 used to illustrate the method of the invention.

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RESULT 1758
                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                               The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-JAN-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 19
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    11-JUN-2002.
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                                                                                                                                                                                                                                                                                                         427
                                                                                                                                                                                                                                                                                                                                           l Similarity
17; Conserv
                                                                                                                                                                                                                                                                       Н
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        resistance; alkylation; therapeutic; diagnostic; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          and reacting with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AM,
                                                                                                                                                                                                                                                                                              TTTTTATTTTATTTTTT
                                                                                                                                                                                                                                                                         TTTTTTTTTTTTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                               Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            PHARM INC.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         moiety; 2'-0-alkyl nucleotide; hybridisation affinity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             #7 used to illustrate the method of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           /note= "5-methyl,
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                                                                                                                                                                                                                                                                                                                                                              1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ester.
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                                                                                                                                                                                                                                                                                                                                             0,
                                                                                                                                                                                                                                                                                                           445
                                                                                                                                                                                                                                                                                                                                                              Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2'-dimethylaminooxyethyl residue"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cook PD,
                                                                                                                                                                                                                                                                                                                                                              .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                                                                                                                                                                                                 2
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                                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                    19;
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AAD4
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                                                                                                                                                                                                                       RESULT 1759
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                       The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                 Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-0-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        08-JAN-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Kawasaki AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            11-JUN-2002
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        Key
modified_base
                                                   Unidentified
                                                                                                                 Oligonucleotide #23 used to illustrate the method of the invention
                                                                                                                                           04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example 46; Col 35; 24pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2002-546338/58.
                                                                                      Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisation affinity;
                                                                                                                                                                    AAD42020
                                                                                                                                                                                             AAD42020 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (ISIS-) ISIS
                                                                           nuclear resistance;
                                                                                                                                                                                                                                                                                     427 TTTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                              l Similarity
17; Conserv
                                                                                                                                                                                                                                                            Tritirititititititi 19
                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                          (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          99US-00227782
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18. .19
15. .18
/*tag=
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/mod_base= OTHER
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            Location/Qualifiers
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/mod_base= OTHER
                                                                                                                                                                                                                                                                                                                         1.6%;
                                                                                                                                                                                               DNA; 19
                                                                            alkylation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               "2'-dimethylaminooxyethyl thymidine (T-2'DMAOE)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            "Phosphorothioate backbone"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Manoharan M,
                                                                                                                                                                                               ВP
                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                          Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                Mismatches
                                                                           therapeutic;
                                                                                                                                                                                                                                                                                                                            1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Cook
                                                                                                                                                                                                                                                                                                                                        DB 1; Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ď,
                                                                        diagnostic;
                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Prakash
                                                                            88.
                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                Gaps
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RESULT 1760
AAD42001
ID AAD4200
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                                                                                                                                                                                                                                                                                                                                                                                                                          δ
                                                                                                                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                               Oligonucleotide #4 used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 46; Col 41; 24pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2002-546338/58.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Kawasaki AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           11-JUN-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     US6403779-B1.
                                                                                                                                                                          Unidentified
                                                                                                                                                                                                     Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisation affinity; nuclear resistance; alkylation; therapeutic; diagnostic; ss.
                                                                                                                                                                                                                                                                        04-NOV-2002
                                                                                                                                                                                                                                                                                                     AAD42001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (ISIS-) ISIS
                                      11-JUN-2002.
                                                                US6403779-B1
                                                                                                                                 modified_base
                                                                                                                                                                                                                                                                                                                               AAD42001 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                           427
                                                                                                                                                                                                                                                                                                                                                                                                                    TTTTTATTTATTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                   TTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           PHARM INC.
                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Fraser AS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      99US-00227782
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 99US-00227782
                                                                                                                                   Location/Qualifiers 16. .19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                /mod_base= OTHER
/note= "2'-O-methyleneiminooxyethyl thymidine"
                                                                                                       /mod
                                                                                           note= "5-methyl, 2'-dimethylaminooxyethyl residues"
                                                                                                                      *tag=
                                                                                                                                                                                                                                                                                                                                DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.6%;
                                                                                                          base= OTHER
                                                                                                                                                                                                                                                                                                                                 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 15.8; DB 1;
Pred. No: 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                             445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cook
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ,
G
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                        0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gaps
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08-JAN-1999;

99US-00227782

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RESULT 1761
AAD42011
ID AAD4201
XX AAD4201
XX Oligon
XX Oligon
XX Oligon
XX Unident
XX U
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-0-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                           modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisa nuclear resistance; alkylation; therapeutic; diagnostic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAD42011
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example 46;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Kawasaki
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (ISIS-) ISIS
Alkylating 2'
                                                                                                                                                                                                                                                                                                                                US6403779-B1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Unidentified
                                                WPI; 2002-546338/58
                                                                                                                                                                                       08-JAN-1999;
                                                                                                                                                                                                                                     08-JAN-1999;
                                                                                                                                                                                                                                                                                    11-JUN-2002
                                                                                               Kawasaki
                                                                                                                                           (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      \vdash
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TTTTTATTTTATTTTTT
                                                                                            AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TTTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Col
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BP; 0 A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                             PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Fraser
    position of
                                                                                               Fraser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    99US-00227782
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                                                                                                                                                                                                                                        99US-00227782.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       31; 24pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                        Location/Qualifiers
16. .19
/*tag= a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            #14 used to illustrate the method of the invention.
                                                                                                                                                                                                                                                                                                                                                                              note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.6%;
                                                                                               AS,
                                                                                                                                                                                                                                                                                                                                                                                                       base= OTHER
                                                                                                                                                                                                                                                                                                                                                                              "2'-dimethylaminooxyethyl thymidine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Manoharan M,
       2',3'-dihydroxy sugar moiety of nucleoside used
                                                                                               Manoharan
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ΒP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ,
,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                               Z,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           3; "L
1.7e+03;
2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cook PD,
                                                                                               Cook
                                                                                                 g,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              hybridisation affinity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Prakash
                                                                                                 Prakash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        88
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                                                                                                    Ţ
                                                                                                                                                                                                                                                                                                                                                                                 (T-2'DMAOE)"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
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for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                         Example 46; Col
                                                                                                          37; 24pp; English.
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The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention

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Sequence 19
BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
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                        Query Match
Best Local S
Matches 17
            427
                        17; Conserv
μ.
      TTTTTATTTTATTTTTTT 445
Conservative
                              1.6%;
                         0;
                                Score 15.8;
Pred. No. 1
                          Mismatches
                               .7e+03;
                                      BB
                                     Length
                          Indels
                                       19;
                          0
                          Gaps
                          0
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RESULT 1762
04-NOV-2002
                   AAD42005;
                                        AAD42005 standard;
(first
                                         DNA; 19
entry)
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Unidentified nuclear Dihydroxy Oligonucleotide #8 used to illustrate the method of the invention resistance; sugar moiety; 2'-0-alkyl nucleotide; hybridisation affinity; ssistance; alkylation; therapeutic; diagnostic; ss.

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\begin{array}{c} \mathsf{CCCC} \times \mathsf{SS} \times \mathsf{SPPP} \\ \mathsf{SPPP} \\ \mathsf{SS} \times \mathsf{SPPP} \\ \mathsf{SPP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  11-JUN-2002.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      /mod_base= OTHER
/note= "5-methyl,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2'-methoxyethyl residues"
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08-JAN-1999; 99US-00227782

08-JAN-1999; 99US-00227782

(ISIS-) ISIS PHARM INC.

Kawasaki AM, Fraser AS, Manoharan Z, Cook g, Prakash Į.

WPI; 2002-546338/58.

Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-0-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.

Example 46; 01 Co1 33; 24pp; English.

The the present invention relates to a novel method of selective alkylation the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. method involves dissolving the nucleoside in at least one aprotic

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AAD42003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                        The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 19
                                                                                                                                                                                                                                Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Dihydroxy sugar moiety; 2'-0-alk nuclear resistance; alkylation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Oligonucleotide #6 used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAD42003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAD42003 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     US6403779-B1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Unidentified
                                                                                                                                                                                         Example 46; Col 33; 24pp; English.
                                                                                                                                                                                                                                                                                             WPI; 2002-546338/58
                                                                                                                                                                                                                                                                                                                        Kawasaki AM,
                                                                                                                                                                                                                                                                                                                                                                                08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                              08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                           11-JUN-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           modified_base
                                                                                                                                                                                                                                                                                                                                                     (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       427
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                                                                                                                                                                                                                     reacting
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                                                                                                                                                                                                                                                                                                                        Fraser
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   mod base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.6%;
                                                                                                                                                                                                                                                                                                                        AS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  "5-methyl,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  рJ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2'-O-alkyl nucleotide; hybridisation affinity;
                                                                                                                                                                                                                       ester.
                                                                                                                                                                                                                                                                                                                        Manoharan
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP.
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Pred.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    therapeutic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2'-0-propyl residues"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15.8; DB 1;
No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                        Σ,
                                                                                                                                                                                                                                                                                                                        Cook
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Sequence 19

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RESULT 1764
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                                                                                             The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics; diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            04-NOV-2002
                                                                                                                                                                                                                                                                     Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming,
                                                                                                                                                                                                                                                                                                                                                                                                  08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                         08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  11-JUN-2002.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; nuclear resistance; alkylation; therapeutic; d:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AAD41998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AAD41998 standard; DNA; 19 BP
                                                                        Sequence 19
                                                                                                                                                                                                                                     Example 46; Col 31; 24pp; English.
                                                                                                                                                                                                                                                                                                                        WPI; 2002-546338/58
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          US6403779-B1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  modified_base
                                                                                                                                                                                                                                                            cooling
                                                                                                                                                                                                                                                                                                                                                  Kawasaki
                                                                                                                                                                                                                                                                                                                                                                          (ISIS-)
                                     Local
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17; Conser
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  TTTTTATTTTATTTTTTT
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                                                                                                                                                                                                                                                                                                                                                  Fraser AS,
                                                                                                                                                                                                                                                                                                                                                                                                  99US-00227782
                                                                                                                                                                                                                                                                                                                                                                                                                         9905-00227782
                                                                          0 A; 0 C; 0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    #1 used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /*tag=
/mod_ba
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /note= "5-methyl,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.6%;
                                     1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               base= OTHER
                                                                                                                                                                                                                                                             ester.
                                                                                                                                                                                                                                                                                                                                                  Manoharan
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 15.8; I
Pred. No. 1.7e
0; Mismatches
                         0
 445
                                       Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                           19
                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2'-aminooxyethoxy (2'-AOE) residues"
                                                                           T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                Z
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0; DB 1;
1.7e+03;
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                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                diagnostic;
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                                                Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 19;
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                            Indels
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                                                                                                                                                                                                                                                                                                 of nucleoside used
                                                    19;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            affinity;
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                          Gaps
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RESULT 1766
AAD42009
ID AAD4200
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AC AAD4200
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AC AAD4200
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OT 04-NOV-
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AAD41999
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                                                                                                                                                                          Query Match
Best Local
                                                                                                                                                                Matches
                                                                                                                                                                                                                                      The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester. The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Oligonucleotide #2 used to illustrate the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                        Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-O-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2002-546338/58.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Kawasaki AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    08-JAN-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             08-JAN-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       nuclear resistance; alkylation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Dihydroxy sugar moiety; 2'-O-alkyl nucleotide; hybridisation affinity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     04-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAD41999;
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  04-NOV-2002
                                                                                                                                                                                                                 Sequence 19 BP; 0
                                                                                                                                                                                                                                                                                                                                                                                   Example 46;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ISIS-) ISIS
                           AAD42009;
                                                   AAD42009
                                                                                                                                       427
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                                                                                                                μ.
                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      standard;
                                                   standard;
                                                                                                                                                                                                                                                                                                                                                                                   Col 31; 24pp; English.
                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           PHARM INC.
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  (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         residues"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  /mod_base= OTHER
/note= "5-methyl,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ′*tag= a
                                                                                                                                                                                                                 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA;
                                                     DNA;
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                                                                                                                                                                            1.6%;
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                                                     19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Manoharan M,
                                                     BP.
                                                                                                                                                                0,:
                                                                                                                                       445
                                                                                                                                                                            Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        therapeutic; diagnostic;
                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2'-dimethylaminooxyethoxy (2'-DMAOE)
                                                                                                                                                                             1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ,
(00)
                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   PD,
                                                                                                                                                                                      Length
                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Prakash
                                                                                                                                                                                          19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     TP.
                                                                                                                                                                 0,
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RESULT 1767
ACF62693
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Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                      Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The present invention relates to a novel method of selective alkylation of the 2' position of 2', 3'-dihydroxy sugar moieties of a nucleoside. The method involves dissolving the nucleoside in at least one aprotic solvent, cooling, treating with base, warming, cooling and reacting with a reactive ester: The method is useful for the preparation of 2'-O-alkyl nucleotides, nucleosides and nucleoside surrogates used for preparation of oligomeric compounds having improved hybridisation affinity and nuclear resistance, which are useful as therapeutics, diagnostics and research reagents. The present sequence is a modified oligonucleotide used to illustrate the method of the invention
Cancer; CYP3A5; irinotecan; pharmaceutical; malignant glioma; cytochrome p450; subfamily IIIA; nifedipine oxidase; polypept cytostatic; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Alkylating 2' position of 2',3'-dihydroxy sugar moiety of nucleoside used for preparation of 2'-0-alkylated compounds comprises dissolving nucleoside in aprotic solvent, cooling, treating with base, warming, cooling and reacting with ester.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Oligonucleotide #12 used to illustrate the method of
                                                                                     Cancer based on CYP3A5 related oligonucleotide
                                                                                                                              08-OCT-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2002-546338/58.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Kawasaki AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            08-JAN-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 nuclear
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     bihydroxy sugar moiety; 2'-0-alkyl nucleotide; hybridisation
                                                                                                                                                                   ACF62693;
                                                                                                                                                                                                             ACF62693
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Example 46; Col 35; 24pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                             427
                                                                                                                                                                                                                                                                                                                                                                                                    17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 resistance; alkylation; therapeutic;
                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                                             standard;
                                                                                                                                                                                                                                                                                                                                         TTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                      TTTTTTTTTTTTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   PHARM INC.
                                                                                                                              (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Fraser AS,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 /*tag= a
/*mod_base= OTHER
/note= "2'-dimethylaminooxyethyl thymidine (T-2'DMAOE)"
                                                                                                                                                                                                               DNA;
                                                                                                                              entry)
                                                                                                                                                                                                                                                                                                                                                                                                                        1.6%;
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                                                                                                                                                                                                                 ΒP
                                                                                                                                                                                                                                                                                                                                                                                                      0;
                                                                                                                                                                                                                                                                                                                                                                                                                          Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Z,
                                                                                                                                                                                                                                                                                                                                                                                                                          1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cook
                                                                                                                                                                                                                                                                                                                                                                                                                                                DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               diagnostic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BD,
                                                                                                                                                                                                                                                                                                                                                                                                         2;
                                                                                         SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                              Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Prakash
                                                                                         ID NO:522
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   the invention.
                          polypeptide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      83
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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              derivative for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprises a cytochrome p450, subfamily IIIA (nifedipine oxidase), polypeptide 5 (CYP3A5) polynuclectide (II). (I) and (II) have cytostatic activity. The therapeutic applications of (I) is improved, since it is possible to individually treat a subject with an appropriate dosage and/or an appropriate derivative of (I). Therefore, undesirable, harmful or toxic effects are efficiently avoided. Unnecessary and potentially harmful treatment of those subjects who do not respond to the treatment with substances (nonresponders), as well as the development of drug resistances due to suboptimal drug dosing can be avoided. ACF62200 to ACF62751 and ABM34912 to ABM35013 represent sequences used in the exemplification of the present invention
                                                                                                                                                                                     Cancer; CYP3A5; irinotecan; pharmaceutical; malignant glioma; cytochrome p450; subfamily IIIA; nifedipine oxidase; polypeptide cytostatic; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New use of irinotecan for preparation of compositions for treating cancer in subject having genome with variant allele comprising cytochrome p450, subfamily IIIA, polypeptide 5 polynucleotide, termed CYP3A5.
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24-MAY-2002; 2002EP-00011710.
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              23-JUL-2001;
24-MAY-2002;
                                                                                                                                                       Synthetic
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                                                            23-JUL-2002; 2002WO-EP008219.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         present invention describes the use of irinotecan (I) or its
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              2001EP-00117608.
2002EP-00011710.
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Pred. No. 1.
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RESULT 1769
ADB2136
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XX Irinote
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Best Local S
Matches 17
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lung cancer; ovarian cancer; pancreatic cancer;
variant allele; multidrug resistance protein 1;
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24-MAY-2002; 2002EP-00011710.
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17; Conserv
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Pred. No. 1.
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malignant gliom
MRP1; cytostati
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Use of irinotecan or its derivative for preparation of a pharmaceutical composition for treating cancer in a subject having a genome with a

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RESULT 1770
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KW Iung ca
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Best Local :
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cancer, or war-s-
allele which comprises
allele which comprises
allele which comprises
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lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
variant allele; multidrug resistance protein 1; MRP1; cytostatic;
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     The present invention describes a method for the use of irinotecan (I) or its derivative for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprises a multidrug resistance protein 1 (MRP1) polynucleotide (II). (I) has cytostatic activity. (I) or its derivative
                                                                                                                                                                                                                                                               Use of irinotecan or its derivative for preparation of a pharmaceutical composition for treating cancer in a subject having a genome with a variant allele comprising a multidrug resistance protein 1 polynucleotide.
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24-MAY-2002;
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                                                                                                                                                                                                             Disclosure;
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2002EP-00011710.
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Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    gene;
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RESULT 1771
ABZ58336
ID ABZ5833
XX ABZ5833
XX ABZ5833
XX Oligonu
XX Synthet
FT modific
FT Toligonu
XX (ISIS-:
XX Oligonu
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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        can be used for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject, where the subject is a human (preferably African or Asian) or a mouse. The present sequence represent a sequence which is used in the exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Oligonucleotide with 2'-0-(2-(methylthio)ethyl)-5-methyluridine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 19
                                                              Increasing binding of oligomeric compound to proteins useful preparation of antisense therapeutics, involves use of modificaligomeric compound having oligonucleotide group.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Oligonucleotide;
DNA-RNA hybrid; s
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ABZ58336 standard; DNA; 19
                                                                                                                                                                                                   03-JUL-2001;
28-JAN-2002;
                                                                                                                                                                                                                                          01-JUL-2002; 2002WO-US020940
                                                                                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                     modified_base
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABZ58336;
                                                                                                                                                 Prakash
                                                                                                                                                                          (ISIS-) ISIS
                                                                                                                                                                                                                                                                      16-JAN-2003
                                                                                                                                                                                                                                                                                                 WO2003004603-A2
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                                                                                                                        2003-239204/23
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                                        27;
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                                                                                                                                               Manoharan
                                                                                                                                                                           PHARM INC
                                                                                                                                                                                                   2001US-0302683P
2002US-00058740
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first entry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /note=
17
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                                                                                                                                                                                                                                                                                                                                                                    /note=
19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Location/Qualifiers
                                                                                                                                                                                                                                                                                                        '*tag= α
/mod_base= OTHER
/note= "2'-0-(2-methylthio)ethyl)-5-methyluridine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                  /mod
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2'-O-(2-(methylthio)ethyl)-5-methyluridine;
                                                                                                                                                                                                                                                                                                                                                                                             mod_base=
                                                                                                                                                                                                                                                                                                                                                                                                                                    note= "2'-0-(2-methylthio)ethyl)-5-methyluridine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                              *tag=
                                        72;
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"2'-0-(2-methylthio)ethyl)-5-methyluridine"
                                                                                                                                                                                                                                                                                                                                                                                -O-(2-methylthio)ethyl)-5-methyluridine"
                                                                                                                                                                                                                                                                                                                                                                                              OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                   OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            <u>,,</u>
                                         English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
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The present sequence is an example of an oligonucleotide of the invention containing 2'-0-(2-(methylthio)ethyl)-5-methyluridine (2'-0-(MTE)-5-

Page

122pp;

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ព័ត្តពិធីពិធីនិង
RESULT 1772
ACC62369/c
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Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; NOVX; antiatherosclerotic; hypotensive; cardiant; dermatological; anorectic; immunosuppressive; cytostatic; antidiabetic; antiinflammatory; antiasthmatic; anti-HIV; immunomodulator; neuroprotective; nootropic; antiparkinsonian; metabolic; antilipaemic; gene therapy; cardiomyopathy; atherosclerosis; hypertension; scleroderma; congenital heart defect; aortic stenosis; valve disease; transplantation; congenital heart defect; aortic stenosis; hyperplasia; diabetes; prostate cancer; metabolic disorder; neoplasm; lymphoma; uterus cancer; fertility; haemophilia; hypercoagulation; graft versus host disease; idiopathic thrombocytopenic purpura; AIDS; bronchial asthma; anorexia; crohn's disease; multiple sclerosis; infectious disease; cancer; cancer-associated cachexia; Alzheimer's disease; rarkinson's disease; remuse disease; haemstociatic discorder; desired access; disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            methyluridine) modifications. In examples of the invention, 2'-O-MTE was incorporated into oligonucleotides and evaluated for antisense properties in comparison with the known 2'-O-(2-methoxyethyl) (2'-O-MOE) modification. The 2'-O-MTE modified oligonucleotides exhibited similar binding affinity to target RNA as their 2'-O-MOE equivalent while binding to human serum albumin was improved. The modification can be used to modulate the pharmacokinetics of oligonucleotides, e.g. in antisense
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 19
                                                                                                                                                                                       17-SEP-2001;
17-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human NOV9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ACC62369 standard;
                                                                                                                                                                                                                                                                                    07-SEP-2001;
                                                                                                                                                                                                                                                                                                                                                     20-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                    WO2003023001-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                   sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    427 TTTTTATTTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   13;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  disorder; haematopoietic disorder; dyslipidaemia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TTTTTTTTTTTTTUUU 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 syndrome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       reverse PCR primer SEQ ID NO:244.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BP; 0
                                         2001US-0318120P
2001US-0318430P
2001US-032636P
2001US-0322781P
2001US-0322816P
2001US-0322817P
2001US-0322817P
2001US-0323631P
2001US-0323631P
2001US-0323636P
2001US-03249469P
2001US-0325091P
2001US-0325091P
2001US-0325091P
2001US-0325091P
2001US-0325091P
2001US-0325091P
2001US-0359599P
2002US-0359599P
2002US-0359599P
2002US-0359599P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                     2002WO-US028538.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                               PCR primer; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 4; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               G; 15 T; 4 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score
Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15.8;
No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0 Other;
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RESULT 1773
ADB88452/C
ID ADB8845
XX
AC ADB8845
XZ
DT 04-DECXX
DE Human U
XX
KW ss; iri
KW colorec

(first

ADB88452

standard;

DNA;

0

ss; irinotecan; cancer; UGTIA1; cytostatic; topoisomerase I inhibitor; colorectal cancer; cervical cancer; gastric cancer; lung cancer;

Human UGT1A1 variant allele sequence fragment SEQ ID NO:521

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Agee ML, Alsobrook JP, And Burgess CE, Casman SJ, Catterton L, Burgess CE, Casman SJ, Catterton L, Eisen I Crabtree J, Dipippo VA, Edinger SR, Eisen JI Gangolli EA, Gerlach VL, Giot L, Gorman J Kekuda R, Khramtsov NV, Leach MD, Lepley Malyankar UM, Miller CE, Ooi CE, Ort T, walyankar UM, Miller CE, Ooi CE, Ort T, KA, Taupier RJ, Tw
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                                                                                                                                                                                                                                            CC hypotensive, dermatological, anoractic, immunosuppressive, cytostatic, cantidiabetic, antiinfertility, haemostatic, antiinflammatory, anti-HTV, cc antiasthmatic, metabolic, immunomodulator, neuroprotective, notropic, antiparkinsonian and antilpaemic activities, and can be used in gene ct therapy. NOVX proteins are useful for treating or preventing a pathology cassociated with the human disease. NOVX nucleic acids, proteins and can be used in the treatment and diagnosis of cardiomyopathy, athropolated sold antibodies can be used in the treatment and diagnosis of cardiomyopathy, catherosciated with the human disease. NOVX nucleic acids, proteins and ct atherosciated with the human disease. NOVX nucleic acids, proteins and continuous sclerosis, scleroderma, obseity, transplantation, congenital heart defects, aortic stenosis, congenital adrenal hyperplasia, prostate cancer, diabetes, metabolic congenital adrenal hyperplasia, prostate cancer, diabetes, metabolic chypercoagulation, idiopathic thrombocytopenic purpura, graft versus host confectious disease, anorexia, cancer acancer, fertility, haemophilia, for fiftectious disease, anorexia, cancer acancer, multiple sclerosis, confectious disease, parkinson's disease, immune disorders, cancer, confectious disease, parkinson's disease, immune disorders, cancer, confectious disease, parkinson's disease, immune disorders, cancer, consect, which are used in examples from the present incomarison with a present a human trypsinger nortein given in comarison with
                                                                             Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         02-JUL-2002; 2002US-0393332P.
17-JUL-2002; 2002US-0396412P.
13-AUG-2002; 2002US-0403517P.
06-SEP-2002; 2002US-00236417.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention describes isolated human NOVX proteins, where 1 to 42. ACC62236 to ACC62345 encode the human NOVX proteins given ABR54167 to ABR54276. NOVX sequences have antiatherosclerotic, cardi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel human proteins and nucleic acid encoding the proteins, use diagnosis, treatment and prevention of disorders involving the protein or nucleic acid e.g. cardiac and neurological disorders
                                                                                                                                                                 Sequence 19
                                                                                                                                                                                                                            sequences, which are used in examples in ABR54277 represents a human trypsinogen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Example C; Page 308; 460pp; English.
                                                                                                                                                                                                             the human
                                     653
9
                          AGTGCAGTGGCGCAATCTT
                                                                                                                                                                                               NOV35b protein in the exemplification of the present invention
                                                                                                                                                                   BP; 5 A;
                                                                               Conservative
                                                                                                   1.6%;
                                                                                                                                                                   6 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Anderson DW, Berghs C, Boldog FL;
Catterton E, Chant JS, Chaudhuri A;
Edinger SR, Eisen AJ, Ellerman K;
Giot L, Gorman L, Guo X, Gusev VV,
Leach MD, Lepley DM, Li L, Liu X;
Ooi CE, Ort T, Padigaru M, Patturaj
                                                                               <u>.</u>
                                                                                                   Score
Pred.
                                     671
                                                                                   Mismatches
                                                                                                   15.8; DB 1
No. 1.7e+03
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Twomlow N,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  neurological
                                                                                                                         Length
                                                                                   Indels
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Vernet CAM,
                                                                                                                         19,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cardiant,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            human
                                                                               Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Voss EZ;
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RESULT 1774
ADB88453
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                                                                                                                                                                                                                                                                                                                                                                     Matches
                                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to the novel use of irinotecan to treat a patient suffering from cancer. This involves determining if the patient has one or more variant alleles of the UGTIA1 gene, and if the patient has one or more of such variant alleles, irinotecan is administered in an increased or decreased amount in comparison to the amount that is administered without regard to the patient's alleles in the UGTIA1 gene. The invention has cytostatic activity. A composition of the invention acts as a topoisomerase I inhibitor. The method is useful for treating a patient, an animal e.g. mouse or a human, preferably African or Asian, suffering from cancer such as colorectal, cervical, gastric cancer, lung, ovarian, pancreatic cancer or malignant glicma. The present sequence is udes in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ovarian
uridine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Use of irinotecan to treat cancer patient by determining if patient has variant alleles of UGTIA1 gene, administering increased/decreased amounts of irinotecan based on increased/decreased levels of UGTIA1 gene product
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    23-JUL-2001; 2001EP-00117608
24-MAY-2002; 2002EP-00011710
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WO2003013536-A2
                                                                                                          ss; irinotecan; cancer; UGTIA1; cytostatic; topoisomerase I inhibitor; colorectal cancer; cervical cancer; gastric cancer; lung cancer; ovarian cancer; pancreatic cancer; malignant glioma; uridine diphosphate glycosyltransferasel member A1.
                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19 BP; 5 A; 4 C; 9 G; 1 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Disclosure; Page 60; 107pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2003-289896/28
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (EPID-) EPIDAUROS BIOTECHNOLOGIE AG.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           23-JUL-2002; 2002WO-EP008217
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                                                                                                                                                                                                     04-DEC-2003
                                                                                                                                                                                                                                                   ADB88453 standard; DNA; 19
          23-JUL-2002; 2002WO-EP008217
                                      20-FEB-2003.
                                                              WO2003013536-A2
                                                                                                                                                                                                                                                                                                                                            832
                                                                                                                                                                            UGT1A1
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diphosphate glycosyltransferasel member Al.
                                                                                                                                                                                                                                                                                                                                                                                 Similarity
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Pred. No. 1.
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RESULT 1775
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Matches 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Use of irinotecan to treat cancer patient by determining if patient has variant alleles of UGT1A1 gene, administering increased/decreased amount of irinotecan based on increased/decreased levels of UGT1A1 gene product
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            lung cance
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          suffering from cancer.
or more variant alleles
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24-MAY-2002; 2002EP-00011710
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; Page 60; 107pp;
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New use of irinotecan for preparation of pharmaceutical compositions for treating cancer in subject having genome with variant allele comprising
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  20-FEB-2003.
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lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
multidrug resistance 1; MDR1; cytostatic; human; ds; Cyp3A5; MRP1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human MDR1 variant allele sequence fragment SEQ
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24-MAY-2002;
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2002EP-00011710
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Pred. No. 1
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multidrug

resistance 1 polynucleotide

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RESULT 1776
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Matches 17
The invention relates to the novel use of irinotecan or its derivative for the preparation of pharmaceutical compositions for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele whice comprises a multidrug resistance 1 (MDR1) polynucleotide. A composition of the invention has cytostatic activity. The invention is useful for the preparation of pharmaceutical compositions for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant
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                                                                                                                                                                                                                                                                                                                New use of irinotecan for preparation of treating cancer in subject having genome multidrug resistance 1 polynucleotide.
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lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
multidrug resistance 1; MDR1; cytostatic; human; ds; Cyp3A5; MRP1; MDR1;
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                                                                                                                                                                                                                                                                Claim
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24-MAY-2002; 2002EP-00011710.
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Pred. No. 1
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RESULT 1777
ADB92627
ID ADB9262
XX ADB9262
XX DAB9262
XX INTROCE
EM Human M
XX INTROCE
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Best Local S
Matches 17
                                                                                              Query Match
Best Local Similarity
Matches 17; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               glioma in a subject (preferably human, more preferably African or Asian) or a mouse. The present sequence is used in the exemplification of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                irinotecan; colorectal cancer; cervical cancer; gast;
lung cancer; ovarian cancer; pancreatic cancer; malic
multidrug resistance 1; MDR1; cytostatic; ds; human;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19
                                                                                                                                                                                                                                                                the preparation of a pharmaceutical composition for treating colorectal cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprise multidrug resistance 1 (MDR1) polynucleotide. A composition of the invention has cytostatic activity. The present sequence is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New use of irinotecan for preparation of treating cancer in subject having genome multidrug resistance 1 polynucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human MDR1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     04-DEC-2003
                                                                                                                                                                                             Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             23-JUL-2001;
24-MAY-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     23-JUL-2002; 2002WQ-EP008220
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO2003013535-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADB92627;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADB92627
                                                                                                                                                                                                                                              exemplification of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Heinrich
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      20-FEB-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             832
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2003-342400/32
                                                                                                                                                                                                                                                                                                                                                                                                                                              8; Page 55; 104pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              \vdash
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      standard; DNA; 19
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  CTCGTGATCTGCCCGCCTC
                                              CTTGTGATCTGCCTGCCTC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CTCGTGATCTGCCCGCCTC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         variant
                                                                                                                                                                                             BP; 1 A; 9 C; 4 G; 5 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Conservative
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                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2001EP-00117608.
2002EP-00011710.
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                                                                                                                                                                                                                                                                                                                                                                                                relates ro a novel use of irinotecan or its derivative
                                                                                                                                                                                                                                                the invention.
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                                                                                                                     1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            9 C; 4 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       89.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      sequence fragment
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  19
                                                                                                                           Score 15.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 15.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
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U;
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                                                                                                                           .7e+03
                                                                                                                                                                                                  0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        pharmaceutical compositions with variant allele comprisi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                밁
                                                                                                                                                  DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               gastric cancer;
malignant gliom
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Ħ
                                                                                                                                                  Length
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                                                                                                   Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        gnant glioma;
UGT1A1; MRP1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             0
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                                                                                                                                                                                                                                                                                                                                                                      colorectal,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      comprising
                                                                                                 Gaps
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RESULT 1778 ADB92626/c

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RESULT 1779
ADE14131/c
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Best Local
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                                                                                                                                                                                                                                                                    The invention relates ro a novel use of irinotecan or its derivative for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprises a multidrug resistance 1 (MDR1) polynucleotide. A composition of the invention has cytostatic activity. The present sequence is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              irinotecan; colorectal cancer; cervical cancer; gastric cancer;
lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
multidrug resistance 1; MDR1; cytostatic; ds; human; UGTIA1; MRP1;
                                                                                                                                                                                                                                                                                                                                                New use of irinotecan for preparation of pharmaceutical compositions for treating cancer in subject having genome with variant allele comprising multidrug resistance 1 polynucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                    23-JUL-2001;
24-MAY-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human MDR1 variant allele sequence fragment
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                                                                                                                                                                                                                                                              exemplification
                                                                                                                                                                                                                                                                                                                                Claim 8; Page 55; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-342400/32.
                                                                                                                                                                                                                                                                                                                                                                                                   Heinrich
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
                                                                                                                                ADE14131 standard;
                                                                                                                                                                                                                                              Sequence
                                               glaucoma
                                                                                Optineurin
                                                                                                                                                                                                                                                                                                                                                                                                                    (EPID-) EPIDAUROS BIOTECHNOLOGIE
09-OCT-2003
                               Homo sapiens
                                                               Human; optineurin; ds; ophthalmological; single nucleotide polymorphism;
                                                                                                29-JAN-2004
                                                       glaucoma;
                                                                                                                                                                                           832 CTTGTGATCTGCCTGCCTC 850
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                                                                                                                                                                                                             l Similarity
17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     standard; DNA;
                                               related disorder;
                                                                                                                                                                                                                                              19
                                                                                                                                                                            CTCGTGATCTGCCCGCCTC 1
                                                                               promoter motif,
                                                                                                                                                                                                                                             BP; 5
                                                                                                                                                                                                             Conservative
                                                                                                                                                                                                                                                                                                                                                                                                    Kerb
                                                                                                                                                                                                                                                                                                                                                                                                                                    2001EP-00117608
2002EP-00011710
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first
                                                                                                (first entry)
                                                                                                                                                                                                                                                              of the invention.
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                                                                                                                                                                                                                                                                                                                                                                                                   77
                                                                                                                                 DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  entry)
                                                                                                                                                                                                                    1.6%;
                                                                                                                                                                                                                                              4 C; 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     19
                                                                                                                                  19
                                               motif;
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                                                                               repeat element or regulatory region #240.
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                                                                                                                                                                                                                                               G; 1 T; 0
                                                                                                                                                                                                             Score 15.8; D)
Pred. No. 1.7e.
0; Mismatches
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                                               hypertensive repeat elemer
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                                                                                                                                                                                                                   1.7e+03
                                                element;
                                                                                                                                                                                                                              DB 1;
                                                                                                                                                                                                                                               Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SEQ
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                                                                                                                                                                                                                              Length 19;
                                                regulatory region
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NO:521
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 밁
                                                                                                                            ADE99245
                                                                                                                                                                                             Query Match
Best Local S
Matches 17
                         Synthetic
                                                                 Modified oligomeric
                                                                                                                   ADE99245 standard; DNA; 19 BP.
         US6600032-B1
                                          nuclease
                                                  Oligomeric
                                                                                                   ADE99245
                                                                                  12-FEB-2004
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CCACCTGCCTCAGCCTCCC 388

CCACCTGCCTCGGCCTTCC 1

resistance; hepatotropic; virucide;

compound; hepatitis C virus; 2'-0-modification;

antiinflammatory;

(first

compound #5 entry) 1 Similarity
17; Conserv

Conservative

0

Mismatches

2

0

Gaps

0

1.6%;

Score 15.8; Pred. No. 1

1.7e+03; DB 1;

Length 19, Indels

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Conservation relates to an isolated nucleic acid (N1) comprising at CC least 20 but not more than 1500 consecutive nucleotides of the optineurin CC promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of detecting a single nucleotide polymorphism (SNP) in the optineurin promoter promoter, a host cell comprising the promoter operably linked to a CC heterologous sequence, diagnosing or prognosing glaucoma in a sample CC obtained from a cell or bodily fluid (comprising detecting a polymorphism CC in a promoter region of the optineurin gene, associated with a glaucoma CC in a promoter region of the optineurin gene, associated with a glaucoma CC in a sample containing DNA, detecting a SNP sequence variation in a sample containing DNA, determining the presence or increased CC in a sample containing DNA, determining the presence or increased CC susceptibility to glaucoma or to a progressive ocular hypertensive CC amplification reaction primers that direct amplification of a selected containing the variation within the optineurin comprising promoter and amplifying the DNA) and detecting a polymorphism (comprising obtaining a sample containing human genomic DNA, providing a nucleic acid crapable of detecting a SNP located within an optineurin promoter, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New nucleic acid sequences of the optineurin gene are useful to polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            06-MAR-2002; 2002US-00091281
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Raymond V,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (SIEE/) SI E.
(RAYM/) RAYMOND V.
(MORI/) MORISSETTE
                                                                                                                  detecting the polymorphism). The invention is used to diagnose and prognose glaucoma and also to treat glaucoma related disorders. The present sequence is an optineurin promoter motif, repeat element or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2003-864168/80
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Sequence 19
                                                                                putative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim 11; SEQ ID NO 242; 159pp; English.
                                                                                regulatory region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Morissette
        BP; 4
        A
        3 C; 11
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        G; 1
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        T, 0 U;
        0 Other;
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detect related

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ADE99265
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention relates to oligomeric compounds having at least one nucleoside. The compounds are useful for therapeutic and investigative purposes and for treating hepatitis C virus infection. The compounds having 2'-O-modifications increases their affinity and nuclease resistance. This sequence represents an oligomeric compound of the
                            Disclosure; SEQ ID NO 26; 26pp;
                                                          New oligomeric compound having at least one nucleoside useful for therapeutic and investigative purposes e.g. for treating hepatitis
                                                                                                                                                                                                                                                                           Oligomeric compound; hepatitis C virus; 2'-0-modification;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI;
                                                                                                                                                         07-AUG-1998;
                                                                                                                                                                                                                                                                                               Modified oligomeric
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New oligomeric compound having at least one nucleoside useful therapeutic and investigative purposes e.g. for treating hepar virus infection.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Manoharan M,
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                                                                                                                 Manoharan
                                                                                                                                                                               06-AUG-1999;
                                                                                                                                                                                                   29-JUL-2003
                                                                                                                                                                                                                         US6600032-B1
                                                                                                                                                                                                                                                                 nuclease resistance; hepatotropic; virucide; antiinflammatory; ss
                                                                                                                                                                                                                                                                                                                     12-FEB-2004
                                                                                                                                                                                                                                                                                                                                                             ADE99265 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Disclosure; SEQ ID NO 5;
                                                                                                                                     (ISIS-)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Local
                                                                                            2003-895259/82
                                                                                                                                                                                                                                                                                                                                                                                                                                     427
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                                                                                                                                                                                                                                                                                                                                                                                                                                                          17;
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                                                                                                                                     ISIS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
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                                                                                                                                     PHARM INC.
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                                                                                                               Cook PD;
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                                                                                                                                                                                                                                                                                                                                                             DNA;
                                                                                                                                                                                                                                                                                                                    entry)
                                                                                                                                                                                                                                                                                                compound
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    89.5%;
                                                                                                                                                                                                                                                                                                                                                               19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               26pp; English.
                                                                                                                                                                                                                                                                                                                                                             BP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                          0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 15.8; DB 1;
Pred. No. 1.7e+03;
                             English.
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The invention re

relates to oligomeric compounds having he compounds are useful for therapeutic

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RESULT 1782
ADH97218
ID ADH9721
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Best Local S
Matches 17
Query Match
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Matches 17; Conservative
                                                                                This invention relates to novel synthetically modified oligomers that have increased nuclease resistance and have enhanced hybrid binding. Such have increased nuclease resistance and have enhanced hybrid binding. Such oligomers are useful for diagnostic and therapeutic uses such as antisense technologies. The invention also discloses a method for the preparation of the oligomers with modifications as fully defined in the specification. The present sequence represents a synthetically modified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             purposes and for treating having 2'-O-modifications resistance. This sequence invention.
                                                 Sequence 19
                                                                                                                                                                                                   Guanidinium therapeutic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 19
                                                                       oligonucleotide
                                                                                                                                                                                                                                                           Manoharan M,
                                                                                                                                                                                                                                                                                                         07-JUL-1999;
                                                                                                                                                                                                                                                                                                                                07-JUL-2000; 2000US-00612531.
                                                                                                                                                                                                                                                                                                                                                                             US6534639-B1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Synthetically
                                                                                                                                                                 Example 26; SEQ ID NO 7; 51pp; English.
                                                                                                                                                                                                                                                                                                                                                       18-MAR-2003.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Nuclease resistance; hybrid binding; antisense technology;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          15-APR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ADH97218;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADH97218 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                     modified_base
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17; Conserv
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                                                 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                   functionalized oligonucleotides used for diagnostic, or investigative purposes comprises a number of nucleotide
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                                                                                                                                                                                                                                                                                                          99US-00349040
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                                                                        the invention.
              1.6%;
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               Score 15.8;
Pred. No. 1.
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Pred. No. 1
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               1.7e+03;
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RESULT 1784
ADH97224
ID ADH9722
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AC ADH9722
XC ADH9722
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KW Nucleas
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Best Local S
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                                                                                                                                                                                                                                                                     This invention relates to novel synthetically modified oligomers that have increased nuclease resistance and have enhanced hybrid binding. Sucoligomers are useful for diagnostic and therapeutic uses such as antisense technologies. The invention also discloses a method for the preparation of the oligomers with modifications as fully defined in the specification. The present sequence represents a synthetically modified oligonucleotide of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                  Guanidinium functionalized oligonucleotides used for diagnostic therapeutic or investigative purposes comprises a number of nuc-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        07-JUL-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Nuclease resistance; hybrid binding; antisense technology;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetically modified nuclease resistant oligomer #3
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                                                                                                                                                                                                                                                    Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                           Manoharan M,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               modified_base
                                   Synthetically modified nuclease resistant oligomer #13.
                                                                               ADH97224;
                                                                                                     ADH97224 standard;
              Nuclease
                                                          15-APR-2004
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                                                                                                                                                                                                        l Similarity
17; Conserv
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                                                                                                     DNA;
                                                        entry)
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                                                                                                                                                                                                                                                  0 C; 0 G; 19 T; 0 U; 0 Other;
              hybrid binding;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  "OTHER = 2'-0-[2-(guanidinium)ethyl]"
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Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                    purposes comprises a number of nucleotide
                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mohan
               antisense technology;
                                                                                                                                                                                                                  .7e+03;
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ABZ97
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                                                               Human; antisense; lung dysfunction; nasal airway dysfunction; antiinflammatory steroid; ubiquinone; antiinflammatory; antiallergic; antiasthmatic; hypotensive; immunosuppressive; cytostatic; gene thera; antisense gene therapy; respiratory; lung; adenosine sensitivity; adenosine receptor; bronchodilation; bronchoconstriction; lung allerglung inflammation; respiratory disease; ds.
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therapeutic
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                                            Homo
                                                                                                                                              Human nucleic acid sequence.
                                                                                                                                                                     17-OCT-2003
                                                                                                                                                                                          ABZ97252;
                                                                                                                                                                                                                ABZ97252 standard; DNA; 19 BP
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                      WO200285308-A2
                                                                                                                                                                                                                                                                                                                                 Local
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                                                                                                                                                                                                                                                                                                                     1 Similarity
17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SEQ ID NO 13; 51pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                functionalized oligonucleotides used for diagnostic, or investigative purposes comprises a number of nuc
                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PHARM INC.
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/mod_base= OTHER
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Prakash
                                                                                                                                                                                                                                                                                                                     0; Mismatches
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                                                                                                                                                                                                                                                                                                                                 Score 15.8; DB 1;
Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                             DB 1;
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                                                                                                                                                                                                                                                                                                                                             Length
                                                                                                                                                                                                                                                                                                                         Indels
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                                                                              allergy;
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Note: The sequence data for this patent is not represented in the printed as pecification, but was obtained in electronic format directly from WIPO as fifting the prophylished or respiratory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                 Human; antisense; lung dysfunction; nasal airway dysfunction; antiinflammatory steroid; ubiquinone; antiinflammatory; antiallergic; antiasthmatic; hypotensive; immunosuppressive; cytostatic; gene therapy; antisense gene therapy; respiratory; lung; adenosine sensitivity; adenosine receptor; bronchodilation; bronchoconstriction; lung allergy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Pharmaceutical composition for treating ailments associated with impaired respiration, has oligo(s) antisense to specific gene(s) or its responding RNAs, and glucocorticoid or non-glucocorticoid steroid or
                                                                                                                                                                                                                                                                                                  17-OCT-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 19 BP; 2 A; 10 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; SEQ ID NO 12494; 872pp; English
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                                       WO200285308-A2
                                                                            Homo sapiens
                                                                                                                                                                                                                                                         Human nucleic acid sequence.
                                                                                                                                                                                                                                                                                                                                                                               ABZ97253 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ftp.wipo.int/pub/published_pct_sequences
                                                                                                                     inflammation;
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L, Shahabuddin
                                                                                                                   respiratory disease; ds
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Pred. No. 1
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RESULT 1787
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Note: The sequence data for this patent is not represented in the printed specification, but was obtained not segmences.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
                                                                                                                        Human; antisense; lung dysfunction; nasal airway dysfunction; antiinflammatory steroid; ubiquinone; antiinflammatory; antiallergic; antiasthmatic; hypotensive; immunosuppressive; cytostatic; gene therapy; antisense gene therapy; respiratory; lung; adenosine sensitivity; adenosine receptor; bronchodilation; bronchoconstriction; lung allergy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to a novel pharmaceutical composition, where the first active agent comprising an oligonucleotide antisense to the initiation codon, coding region, 5' or 3' end genomic flanking
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; SEQ ID
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pharmaceutical composition for treating ailments associated with impaired respiration, has oligo(s) antisense to specific gene(s) or its corresponding RNAs, and glucocorticoid or non-glucocorticoid steroid or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                24-APR-2001; 2001US-0286137P
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                                                                                                                                                                                                                                         Human
                                                                                                                                                                                                                                                                             17-OCT-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 19 BP; 1 A; 11 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                  ABZ97333;
                                                                                                                                                                                                                                                                                                                                                       ABZ97333 standard;
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                                                                                                          inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    839 rerecerecerecere 857
                                                                                                                                                                                                                                       IL4-R oligonucleotide sequence.
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, Tang L,
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                                                                                                                                                                                                                                                                             (first entry)
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L, Shahabuddin S;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             PHARM INC
                                                                                                                                                                                                                                                                                                                                                       DNA; 19
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                                                                                                        respiratory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            89.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Score 15.8;
                                                                                                          disease; ds
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
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WO200285308-A2 Homo sapiens.

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Best Local S
Matches 17
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Miller S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Pharmaceutical composition for treating ailments associated with impaired respiration, has oligo(s) antisense to specific gene(s) or its respiration RNAs, and glucocorticoid or non-glucocorticoid steroid or corresponding RNAs, and glucocorticoid or non-glucocorticoid steroid or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                lung surfactant in a subject's tissue, or treating bronchoconstriction. lung inflammation, lung allergies, or a respiratory disease or condition. Note: The sequence data for this patent is not represented in the printed specification, but was obtained in electronic format directly from WIPO
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                                                                                                                   Human; antisense; lung dysfunction; nasal airway dysfunction; antiinflammatory steroid; ubiquinone; antiinflammatory; antiallergic; antiasthmatic; hypotensive; immunosuppressive; cytostatic; gene therapy antisense gene therapy; respiratory; lung; adenosine sensitivity; adenosine receptor; bronchodilation; bronchoconstriction; lung allergy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to a novel pharmaceutical composition,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Disclosure; SEQ ID NO 12575; 872pp; English
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                                                                                                                                                                                                                          Human IL4-R oligonucleotide sequence.
                                                                                                                                                                                                                                                                                                ABZ97334;
                                                                                                                                                                                                                                                                                                                               ABZ97334 standard; DNA; 19
                                                                  Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ftp.wipo.int/pub/published_pct_sequences
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                                                                                                   inflammation;
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17; Conser
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Tang
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, Shahabuddin
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                                                                                                   respiratory
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G;
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Pred. No. 1.7e
0; Mismatches
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                                                                                                    disease; ds
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                                                                                                                                                        therapy;
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31-OCT-2002

14-OCT-2002; 2002WO-AU001388

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Miller S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention relates to a novel pharmaceutical composition, which first active agent comprising an oligonucleotide antisense to the initiation codon, coding region, 5' or 3' end genomic flanking reg 5' and 3' intron-exon junctions or recipe within a composition.
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                                                                                                                                                                                                                 Genetic marker selection; multiplex PCR amplification; prenatal diagnostic testing; foetal sex determination; genetic identification; DNA profiling; DNA fingerprint forensic analysis; PCR; primer; ss.
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                                                                                                                                                                                                                                                                                                                                                            Selection and amplification of genetic markers PCR
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ACA58281/c
ID ACA582
XX
AC ACA582
AC ACA582
XX
O9-JUN
XX
Human;
KW Human;
KW Chromo
KW D4S424
XX
OS Homo 6
XX
US2002
XX
IJ-DEC
XX
IJ-DEC
XX
PF 13-JUN
XX
PF 29-MAF
PR 20-OCT
PR 19-OCT
PR 19-OCT
XX
PA (GINN)
PA (EGEL/
PA (PAUL/
XX
PI Ginns
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     밁
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  RESULT 1790
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
Matches 17
                                                                                                 29-MAR-1996;
20-OCT-1997;
19-OCT-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              multiplex PCR amplification from limiting amounts of target nucleic acid. The methods are also useful for improving genetic diagnostic and screening methods, such as prenatal diagnostic testing, foetal sex determination or genetic identification, e.g. DNA profiling or DNA fingerprinting. The nucleic acid sequence amplification is also useful inforensic analysis of degraded, old, ancient and difficult samples that are difficult to amplify and identify. This sequence represents a PCR primer used in the selection and amplification of genetic markers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        werecting genetic markers as targets for nucleic acid sequence amplification, useful for improving genetic testing, e.g. fetal sex determination, comprises selecting each of the genetic markers according to a heterozygosity index.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention describes a method of selecting genetic markers as targets for nucleic acid sequence amplification comprising selecting each of the genetic markers according to a heterozygosity index of 0.5 or greater. Selecting and amplification of genetic markers are useful as targets for nucleic acid sequence amplification, for genetic testing or facilitating nucleic acid sequence amplification.
   Ginns EI,
                                                                                                                                                                                                                                                                                                                     Human; genotype chromosomal reg:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2003-381725/36.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Findlay I,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12-OCT-2001; 2001AU-00008234.
12-OCT-2001; 2001AU-00008235.
                                (GINN/) GINNS E I.
(EGEL/) EGELAND J A.
(PAUL/) PAUL S M.
                                                                                                                                                                  13-JUN-2001; 2001US-00881012
                                                                                                                                                                                                                                   US2002192655-A1.
                                                                                                                                                                                                                                                                  Homo sapiens
                                                                                                                                                                                                                                                                                                    D4S424; D4S431;
                                                                                                                                                                                                                                                                                                                                                                  Human familial bipolar affective disorder chromsome marker primer #229
                                                                                                                                                                                                                                                                                                                                                                                                    09-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ACA58281 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (UYQU ) UNIV QUEENSLAND
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   640
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  36; Page 39; 64pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1 Similarity
17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TCACCCAGGCCGGAGTTCA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TCACCCAGGCTGGAGTGCA 658
Egeland JA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matthews
                                                                                                                                                                                                                                                                                                                region
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                 96US-0014334P.
97US-0062924P.
98US-00175158.
                                                                                                                                                                                                                                                                                                 ion linked; locus associated with resistance; D4S402; D4S404; D11S394; D11S29; chromosome marker; primer; ss
                                                                                                                                                                                                                                                                                                                                   determination; familial bipolar affective
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  PL,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     5 C; 7
   Paul
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mulcahy
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ٥,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Pred. No. 1.76
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 15.8; DB 1;
Pred. No. 1.7e+03;
     SM;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0
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associated with resistance to bipolar affective disorder, where the chromosomal regions are included of and localised between D4S402 and D4S424, D4S431 and D4S404, or D11S39 and D1S39. The invention also discloses a kit for determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder, where the kit comprises markers for two or more of the chromosomal regions cited. The method and kit are useful for determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder in a family affected by bipolar affective disorder, for determining the contribution of these chromosomal regions to bipolar affective disorder in an affective family member, and for assessing an increased or decreased risk of developing bipolar illness for a tested individual from an affected family. ACA58053-ACA58292 represent primers used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                      associated with increased or decreased resources. The genotype with affective disorder. The method comprises determining the genotype with least one marker of at least one chromosomal region linked to a locus least one marker of at least one farmers affective disorder, where the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; Page 12; 79pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder in a family comprises determining the genotype of e.g., chromosomal regions D4S402 and D4S424.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-352708/33.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The present invention relates to a method of determining a genotype associated with increased or decreased resistance to familial bipolar
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             at
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Query Match Best Local Matches Local Similarity 640 19 TCACCCAGGCTGGAGTGCA TCACCCAGGCCGGAGTTCA 1 Conservative 1.6%; 0; 658 Score 15.8; Pred. No. 1 Mismatches 1.7e+03; 멂 1; Length Indels 19; 0 Gaps

0

Sequence 19 BP; 3 A; 5 C; 7 G; 4 T; 0 U; 0 Other;

present invention

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RESULT 1791
ADM65614
                            US2003134285-A1
                                                                                             non-recombining
                                                                                                                           ethnic origin determination; polymorphic site determination;
                                                                                                                                                          NRY polymorphism detection primer #515.
17-JUL-2003
                                                             Homo sapiens
                                                                                                                                                                                                                                                       ADM65614 standard;
                                                                                                             chromosome;
                                                                                                                                                                                          (first
                                                                                                            paternity
                                                                                           region;
                                                                                                                                                                                                                                                       DNA;
                                                                                                                                                                                          entry)
                                                                                           testing; for human; NRY;
                                                                                                            forensic; diagnosis;
                                                                                             PCR; primer;
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01-NOV-2000; 2000US-0245355P

(OEFN/) OEFNER P J.

UNDERHILL P A.

01-NOV-2001; 2001US-00002623.

Determining the ethnic origin of a male by obtaining a nucleic acid sample from the male and identifying at least two polymorphic market the nucleic acid sample indicative of the ethnic origin of the male

c markers

ä

WPI; 2003-843259/78.

PJ,

Underhill

PA;

Claim 24; Page 57; 74pp; English

The invention describes a method of determining the ethnic origin of a CC male comprising obtaining a nucleic acid sample from the male, and comprising obtaining a nucleic acid sample from the male, and comprising at least two polymorphic markers in the nucleic acid sample condicative of the ethnic origin of the male, using at least one primer cc pair from the primer pairs given in the specification. Also described is compared to the ethnic origin of an individual; determining the ethnic origin of an individual; determining the ethnic cc origin of a human male individual; an isolated nucleic acid segment of a numan y chromosome comprising at least 10 contiguous bases including at CC human y chromosome comprising at least 10 contiguous bases including at CC acid primer pairs for amplifying polymorphic regions of the y chromosome given in the specification; nucleic acid primer pairs for amplifying polymorphic regions of the Y chromosome CC individual. The method is useful for determining the ethnic origin of a compared for paternity testing, for forensic studies or for diagnosis. This cc sequence represents a primer used to detect polymorphisms in the non-recombining region of the human y chromosome (NRY).

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1056 CCACACCCCGCTAATTTTT 1074

Query Match Best Local Matches

Local Similarity mes 17; Conserv

Conservative

0,

1.6%;

Score'15.8; DB 1; Pred. No. 1.7e+03; Mismatches

Length 19; Indels

0;

Gaps

Ö

Sequence 19

BP; 4 A;

3 C; 7 G; 0 T; 5 U;

0 Other;

Sequence 19 BP; 4 A;

8 C; 1 G; 6 T; 0 U; 0 Other;

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RESULT 1792
ADO14381/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     В
                                                                                                                                                                   20-FEB-2002;
11-MAR-2002;
06-JUN-2002;
                                                                                                                                                                                                                                                                                                                                                                     cytostatic; vasotropic; nephrotropic; cancer; restenosis; polycystic kidney disease; RNA interference; short interfering RNA; siRNA; short interfering RNA; siRNA; double-stranded RNA; micro-RNA; miRNA; short hairpin RNA; shRNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  01-JUL-2004 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADO14381 standard; RNA; 19
                                                                                                                                                                                                                                                                                                                                             expression modulation; gene therapy; drug screening; diagnosis; therapeutic target identification; pharmacogenomics;
                                                                                                                                                                                                                                                                                                                                                                                                                                         Human interleukin-2-targeted siNA upper strand SEQ ID NO:116
New short interfering nucleic acid, useful e.g. for treatment and diagnosis of cancer, downregulates expression of an interleukin g
                                                                                                                                            29-AUG-2002;
05-SEP-2002;
                                                                                                                                                                                                                          11-FEB-2003; 2003WO-US004566.
                                                                                                                                                                                                                                                                             WO2003070744-A1
                                                                                                                                                                                                                                                                                                       Homo sapiens.
                                         WPI; 2003-731546/69.
                                                                Mcswiggen J,
                                                                                                                                                                                                                                                   28-AUG-2003
                                                                                            (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                  function
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       CCACACCCAGCTCATTTT
                                                                                                                   2002US-0406784P.
2002US-0408378P.
2002US-0409293P.
2003US-0440129P.
                                                                                                                                                                     2002US-0358580P.
2002US-0363124P.
2002US-0386782P.
                                                                                                                                                                                                                                                                                                                                arget identification; pharmacogenomics;
analysis; gene mapping; human; interle
                                                                Beigelman
                                                                Ļ
                                                               Thompson
                                                                                                                                                                                                                                                                                                                                    interleukin-2; ss
 gene.
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CC downregulate expression of the human interleukin-2 gene by RNA
CC interference. The siNAs may or may not comprise ribonucleotides and may
CC be double or single stranded. They further comprise sense and antisense
CC regions, or alternatively are assembled from a sense oligonucleotide and
CC an antisense oligonucleotide. Specifically, the siNAs include short
CC interfering RNA (siRNA). The siNAs can be unmodified or chemically modified,
CC can contain deoxyribonucleotides, and can be chemically synthesised,
CC can contain deoxyribonucleotides, and can be chemically synthesised,
CC expressed from a vector or enzymatically synthesised. The invention also
CC expressed from a vector or enzymatically synthesised. The siNAs are
CC used to modulate expression of the interleukin-2 gene in cells, tissue
CC explants or organisms (e.g., by ex vivo gene therapy), or in grafts and
CC transplants for the treatment of a variety of conditions. They may be
CC used for treating canner, restenosis and polycystic kidney disease. The
CC siNAs are also useful for drug screening, diagnosis, therapeutic target
CC identification and validation, genetic engineering, pharmacogenomics,
CC studying gene function, and gene mapping (e.g., of single nucleotide
CC polymorphisms). The present sequence represents the upper strand of a
CC human interleukin-2-targeted double-extranded siNA, which is identical to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to short interfering nucleic acids
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 3; SEQ ID NO 116; 138pp; English.
interleukin-2 transcript target sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (siNA) which
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*# *.5555555555555555555555555555555

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1.6%;
Best Local Similarity 89.5%;
Matches 17; Conservation
                   1121 TCAAACTCCTGACCTCAGG 1139
19
                                        0; Mismatches
                                                 Score 15.8;
Pred. No. 1.
                                                .7e+03;
                                                            DB 1;
                                                          Length 19;
                                         Indels
                                         0,
                                         Gaps
                                          0
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RESULT 1793
ADO14386/c
                                                                   06-JUN-2002;
29-AUG-2002;
05-SEP-2002;
09-SEP-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cytostatic; vasotropic; nephrotropic; cancer; restenosis; polycystic kidney disease; RNA interference; short interfering RNA; siRNA; short interfering RNA; siRNA; double-stranded RNA; micro-RNA; miRNA; short hairpin RNA; shRNA;
                                                                                                                                                                             20-FEB-2002;
11-MAR-2002;
                                                                                                                                                                                                                                                      11-FEB-2003; 2003WO-US004566
                                                                                                                                                                                                                                                                                                                                                             WO2003070744-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         expression modulation; gene therapy; drug screening; diagnosis; therapeutic target identification; pharmacogenomics;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human interleukin-2-targeted siNA upper strand SEQ ID NO:121
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  01-JUL-2004 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADO14386 standard; RNA; 19 BP
                                                                                                                                                                                                                                                                                                         28-AUG-2003.
                                                                                                                                                                                                                                                                                                                                                                                                             Homo sapiens
(RIBO-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 function analysis; gene mapping;
RIBOZYME PHARM INC
                                              ; 2002US-0358580P.
2002US-0363124P.
; 2002US-0386782P.
; 2002US-0406784P.
; 2002US-0408378P.
; 2002US-0409293P.
; 2002US-0409293P.
; 2003US-0440129P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    human; interleukin-2; ss
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RESULT 1794
ADO14514
ID ADO1451
   PRRRACE SECTION OF SEC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  downregulate expression of the human interleukin-2 gene by RNA

Chinterference. The siNAs may or may not comprise ribonucleotides and may

the double or single stranded. They further comprise sense and antisense

cregions, or alternatively are assembled from a sense oligonucleotide and

an antisense oligonucleotide. Specifically, the siNAs include short

interfering RNA (siRNA, double-stranded RNA, micro-RNA (miRNA) and short

creating RNA (siRNA). The siNAs can be unmodified or chemically modified,

creating and a rector or enzymatically synthesised.

Creating a rector or enzymatically synthesised. The invention also

crelates to kits for the in vitro or in vivo delivery of siRNA; conjugates

and/or complexes of siRNA; and vectors that express siNA. The siNAs are

cused to modulate expression of the interleukin-2 gene in cells, tissue

explants or organisms (e.g., by ex vivo gene therapy), or in grafts and

creating cancer, restenosis and polycystic kidney disease. The

siNAs are also useful for drug screening, diagnosis, therapeutic target

cidentification and validation, genetic engineering, pharmacogenomics,

studying gene function, and gene mapping (e.g., branded siNA, which is identical to

the interleukin-2-targeted double-stranded siNA, which is identical to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local :
20-FEB-2002; 2002US-0358580P.
11-MAR-2002; 2002US-036312EP.
06-JUN-2002; 2002US-0386782P.
29-AUG-2002; 2002US-0406784P.
                                                                                                                                                                                                                                                                                                                                                                                                                                    expression modulation; gene therapy; drug screening; diagnosis; therapeutic target identification; pharmacogenomics; gene function analysis; gene mapping; human; interleukin-2; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cytostatic, vasotropic; nephrotropic; cancer; restenosis; polycystic kidney disease; RNA interference; short interfering nucleic acid; siNA; short interfering RNA; shRNA; double-stranded RNA; micro-RNA; miRNA; short hairpin RNA; shRNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New short interfering nucleic acid, useful e.g. for treatment and diagnosis of cancer, downregulates expression of an interleukin gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     01-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 19 BP; 3 A; 7 C; 4 G; 0 T; 5 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mcswiggen
                                                                                                                                                                        11-FEB-2003; 2003WO-US004566
                                                                                                                                                                                                                                                                                                             WO2003070744-A1
                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human interleukin-2-targeted siNA lower strand SEQ ID NO:249
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADO14514;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADO14514 standard; RNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to short interfering nucleic acids (siNA) which
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  interleukin-2 transcript target sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       729 AGTAGCTGGGACTACAGGC 747
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AGTGGCTAGGACTACAGGC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ŗ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SEQ ID NO 121; 138pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Beigelman
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Score 15.8; Di
Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Thompson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Length 19,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SIRNA;
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The invention relates to short interfering nucleic acids (siNA) which CC downregulate expression of the human interleukin-2 gene by RNA CC interference. The siNAs may or may not comprise ribonucleotides and may be double or single stranded. They further comprise sense and antisense CC regions, or alternatively are assembled from a sense oligonucleotide and interfering RNA (siRNA, double-stranded RNA, micro-RNA (miRNA) and short CC interfering RNA (siRNA, double-stranded RNA, micro-RNA (miRNA) and short CC can contain deoxyribonucleotides, and can be chemically synthesised, CC expressed from a vector or enzymatically synthesised. The invention also CC relates to kits for the in vitro or in vivo delivery of siRNA; conjugates CC and/or complexes of siRNA; and vectors that express siNA. The siNAs are CC and/or complexes of siRNA; and vectors that express siNA. The siNAs are CC used to modulate expression of the interleukin-2 gene in cells, tissue CC explants or organisms (e.g., by ex vivo gene therapy), or in grafts and CI transplants for the treatment of a variety of conditions. They may be CC used for treating cancer, restenosis and polycystic kidney disease. The conditication and validation, genetic engineering, pharmacogenomics, conjugates conjugates for the function, and gene mapping (e.g., of single nucleotide CC polymorphisms). The present sequence represents the lower strand of a human interleukin-2-targeted double-stranded siNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 05-SEP-2002;
09-SEP-2002;
15-JAN-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             diagnosis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2003-731546/69.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mcswiggen J,
Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 3; SEQ ID NO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           interfering nucleic acid, useful e.g. of cancer, downregulates expression o
BP; 5 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2002US-0408378P
2002US-0409293P
2003US-0440129P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Beigelman L,
    4 C; 7 G; 0 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 249; 138pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Thompson
    ω
    U; 0 Other;

 for treatment as
of an interleukin

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             gene.
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밁 5 Query Match Best Local S Matches Local Similarity . بىر 729 AGTAGCTGGGACTACAGGC 747 AGUGGCUAGGACUACAGGC 19 Conservative 1.6%; 73.7%; ω •• Score 15.8; Pred. No. 1. Mismatches 1.7e+03; DB 1; Length 19; Indels 0 Gaps

0

ADO14509 ID ADO1 RESULT 1795 ADO14509 standard; RNA; 19

Human interleukin-2-targeted siNA lower strand SEQ ID NO:244

01-JUL-2004

(first entry)

cytostatic; vasotropic; nephrotropic; cancer; restenosis; polycystic kidney disease; RNA interference; short interfering RNA; siRNA; short interfering RNA; siRNA; double-stranded RNA, micro-RNA; miRNA; short hairpin RNA; shrNA; expression modulation; gene therapy; drug screening; diagnosis; therapeutic target identification; pharmacogenomics; Homo sapiens tunction analysis; gene mapping; human; interleukin-2; ss

WO2003070744-A1

28-AUG-2003

11-FEB-2003; 2003WO-US004566

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CC regions, or alternatively are assembled from a sense oligonucleotide and can antisense oligonucleotide. Specifically, the siNAs include short cinterfering RNA (siRNA, double-stranded RNA, micro-RNA (miRNA) and short chairpin RNA (shRNA). The siNAs can be unmodified or chemically modified, cc can contain deoxyribonucleotides, and can be chemically synthesised. CC expressed from a vector or enzymatically synthesised. The invention also crelates to kits for the in vitro or in vivo delivery of siRNA, conjugates cc and/or complexes of siRNA; and vectors that express siNA. The siNAs are cc used to modulate expression of the interleukin-2 gene in cells, tissue cc explants or organisms (e.g., by ex vivo gene therapy), or in grafts and cc transplants for the treatment of a variety of conditions. They may be used for treating cancer, restenosis and polycystic kidney disease. The cc identification and validation, genetic engineering, pharmacogenomics, studying gene function, and gene mapping (e.g., of single nucleotide polymorphisms). The present sequence represents the lower strand of a human interleving double-stranded sinA.
 RESULT 1796
ABD30364
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11-MAR-2002;
16-JUN-2002;
06-JUN-2002;
29-AUG-2002;
05-SEP-2002;
09-SEP-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to short interfering nucleic acids (siNA) which downregulate expression of the human interleukin-2 gene by RNA interference. The siNAs may or may not comprise ribonucleotides and may be double or single stranded. They further comprise sense and antisense
                                                 Human; antisense; bronchoconstriction; allergy; hyposecretion; pain; respiratory tract inflammation; adenosine semsitivity; lung; cancer; surfactant depletion; antiallergic; antiinflammatory; antiasthmatic; analgesic; hypotensive; immunosuppressive; cytostatic; cystic fibrosis; beta-adrenergic agonist; respiratory disease; pulmonary vasoconstriction; respiratory distress syndrome; allergic rhinitis; pulmonary hyportension; emphysema; chronic obstructive pulmonary disease; cancer; bronchitis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 3;
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                                                                                                                                                                                                  Human IL4-R derived oligonucleotide
                                                                                                                                                                                                                                                                                                             ABD30364 standard; DNA; 19
                                                                                                                                                                                                                                        29-JUL-2004
Homo sapiens
                                  pulmonary transplantation rejection; ss;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Local Similarity nes 13; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                          1121 ТСАААСТССТGАССТСАСС 1139
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          interleukin-2-targeted double-stranded siNA.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ; 2002US-0386782P.
; 2002US-0406784P.
; 2002US-0408378P.
; 2002US-0409293P.
; 2003US-0440129P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
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2002US-0363124P.
                                                                                                                                                                                                                                      (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        nucleic acid, useful e.g. for treatment ar downregulates expression of an interleukin
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.8;
Pred. No. 1.
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                                                                                                                                                                                                   SEQ ID 12575.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.7e+03
                                    primer
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 19;
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29-JUL-2004 ABD30365; ABD30365

(first entry)

RESULT 1797 ABD30365

standard; DNA; 19

ΒP

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expression of a target polypeptide associated with lung airway or lung cysfunction or cancer and can be anti-sense to the corresponding mRNA. Combenies in the invention also describes a kit, that comprises: (a) a delivery composition also describes a kit, that comprises: (a) a delivery composition also describes a kit, that comprises: (a) a delivery composition and invention has antiallergic, antianflammatory, antiasthmatic, comprises invention has antiallergic, antianflammatory, antiasthmatic, composition comprises oligo and is administered to reduce the production composition comprises oligo and is administered to reduce the production composition of the target polypeptide present in the lungs. The composition composition, and/or bronchoconstriction and/or lung composition, allergies and/or surfactant hypoproduction are associated with a disease or condition such as pulmonary vasoconstriction.

Composition, allergies, asthma, impeded respiration, respiratory composition and adenosine content of the anti-sense oligos corresponding to the the reduced adenosine content of the anti-sense oligos corresponding to the coligonucleotides into products that free adenosine into the system content of the serves to prevent the breakdown of the coligonucleotides into products that free adenosine into the system content of the serves to prevent the breakdown of the coligonucleotides into products that free adenosine into the system content of the content and thereby. to
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                                  S
                                                                           Matches
                                                                                                              Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pharmaceutical composition for treating asthma, has antisense oligonucleotide containing less percentage of adenosine, targeted nucleic acids associated with lung airway or lung dysfunction, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        31-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    bronchoconstriction, respiratory tract inflammation, allery reducing adenosine sensitivity, levels of adenosine (A) or envious descriptions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        24-APR-2001; 2001US-0286036P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  surfactant depletion or hyposecretion, when administered to a mammal.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   bronchodilating agent.
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                                                                                                                                                       Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   comprising oligonucleotides, effective for alleviating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      This invention describes a novel composition (a) a first active agent,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (EPIG-)
                                                                                              Local
                                    885 CACCACGCCCGGCTTATTT 903
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                                                                         l Similarity
17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    EPIGENESIS PHARM INC
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  CACCACGCCCGGCTTCTCT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SEQ ID NO 12575; 763pp; English
                                                                                                                                                       BP; 2 A;
                                                                                                                                                                                              unwanted effects
                                                                                                                                                                                                                brain, heart,
                                                                           Conservative
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L, Shahabuddin S;
                                                                                            1.6%;
                                                                                                                                                       10 C; 3
                                                                                                                                                                                              kidney, etc, tissue cts due to it
                                                                           0; Mismatches
                                                                                                                                                       G; 4 T; 0 U;
                                                                                              Score 15.8; DB 1
Pred. No. 1.7e+03
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                                                                                                                    DB 1;
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                                                                                                                                                           0 Other;
                                                                                                                  Length
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                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   allergies and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Aguilar D;
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nammal. The
                                                                           Gaps
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CC expression of a target polypeptide associated with lung airway or lung CC dysfunction or cancer and can be anti-sense to the corresponding mRNA. CC The invention also describes a kit, that comprises: (a) a delivery. CC device, in separate containers, (b) the oligonucleotides, (c) instructions for adding a carrier and for use of the kit. The composition CC of the invention has antiallergic, antiinflammatory, antiasthmatic, CC analgesic, hypotensive, immunosuppressive and cytostatic activity, is a beta-adrenergic agonist. The composition is useful for preventing or CC treating a respiratory, lung or malignant disease. The administered CC composition comprises oligo and is administered to reduce the production or availability, or to increase the degradation of the target mRNA or to CC reduce the amount of target polypeptide present in the lungs. The CC pulmonary obstruction, and/or bronchoconstriction and/or lung confilmmation, allergies and/or surfactant hypoproduction are associated with a disease or condition such as pulmonary vasoconstriction, cc inflammation, allergies asthma, impeded respiration, respiratory CC distress syndrome, pain, cystic fibrosis, allergic rhinitis, pulmonary transplantation respection, pulmonary infections, bronchitis or cancer. The reduced adenosine content of the anti-sense oligos corresponding to thymidines present in the target RNA serves to prevent the breakdown of the oligonary brain, heart, kidney, etc, tissue environment and thereby, to prevent any unwanted effects due to it
Best Local Similarity
Matches 17; Conserv
                                             Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; antisense; bronchoconstriction; allergy; hyposecretion; pain; respiratory tract inflammation; adenosine sensitivity; lung; cancer; surfactant depletion; antiallergic; antiinflammatory; antiasthmatic; analgesic; hypotensive; immunosuppressive; cytostatic; cystic fibrosis; beta-adrenergic agonist; respiratory disease; pulmonary vasoconstriction; respiratory distress syndrome; allergic rhinitis; pulmonary hypertension; emphysema; chronic obstructive pulmonary disease; cancer; bronchitis; pulmonary transplantation rejection; ss; primer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                This invention describes a novel composition (a) a first active agent, comprising oligonucleotides, effective for alleviating bronchoconstriction, respiratory tract inflammation, allergies and reducing adenosine sensitivity, levels of adenosine (A) or (A) recepto surfactant depletion or hyposecretion, when administered to a mammal.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Pharmaceutical composition for treating asthma, has antisense oligonucleotide containing less percentage of adenosine, targeted to nucleic acids associated with lung airway or lung dysfunction, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WO200285309-A2
                                                                                            Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             oligonucleotides are derived from a gene encoding or regulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   bronchodilating agent.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          15; SEQ ID NO 12576; 763pp; English
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, Tang L,
                                                                                            BP; 1 A;
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L, Shahabuddin S;
                     89.5%;
                                                                                            11 C; 3 G; 4 T; 0 U; 0 Other;
                       Score 15.8; DB 1
Pred. No. 1.7e+03
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                                          Length 19;
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RESULT 1798
ADG28485
ID ADG2848
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Best Local (
                                                                Matches
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02-SEP-1994;
28-FEB-1996;
                                                                                                                                                                         The invention describes an oligonucleotide comprising several nucleotides covalently linked together by internucleotide linkages. At least one of the nucleotides is linked to an adjacent nucleotide by 2',5',5', internucleotide linkage and bears a 3'-substituent. The oligonucleotides are useful; as antisense oligonucleotides, in pharmaceutical compositions, for treating organisms having disease caused by undesired production of protein e.g. organism that utilises RNA-DNA transcription or RNA-protein translation, bacteria, yeast, protozoa, algae and warm-blooded animals; for developing diagnostic and therapeutic agents. The modified oligonucleotide exhibits improved properties of nuclease resistance and binding affinity. The oligonucleotides are easy to synthesise and exhibit good properties of nuclease resistance and hybridisation to target nucleic acids. The oligonucleotide is potent antisense agent with longer duration of action. This sequence represents an oligonucleotide of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New oligonucleotide comprising at least one 2',5'-internucleotide useful for treating organisms having disease caused by undesired
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                                                                                                                             Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                           Example 54; SEQ ID NO 6; 30pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                         production of protein e.g. bacteria, yeast, protozoa and algae
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       08-NOV-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   antibacterial; protozoacide; antialgal; fungicide;
internucleotide linkage; 2',5'-internucleotide linkage; 3'-substituent;
antisense; pharmaceutical; RNA-DNA transcription;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Modified oligonucleotide seq id 6.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      14-JUL-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        US6653458-B1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     nuclease resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RNA-protein translation; infection; diagnostic; therapeutic;
                                                                                                                                                             invention.
                                427
                                                                17;
,..
                                                                               Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  TCTGCCCGCCTCAGCCTCC 19
                    TTTTTATTTTATTTTTTT
                                                                                                                             BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       94WO-US010131.
96US-00602862.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         93US-00117363.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       99US-00435806.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         PD,
                                                                             1.6%;
                                                              0;
                                                                               Score 15.
Pred. No.
                                                                 Mismatches
                                                                                             15.8;
                                                                                 .7e+03
                                                                                              DB 1; Length 19;
                                                                 Indels
                                                                0;
                                                                Gaps
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839 TCTGCCTGCCTCGGCCTCC 857

0;

Mismatches

Indels

0

Gaps

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RESULT 1800
ADG48004
ID ADG4800
XX ADG4800
XX ADG4800
XX I1-MAR-
XX Oligonu
XX Hybridi
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                                                                                                                                      Query Match
Best Local
                                                                                                                               Matches
                                                                                                                                                                         The present invention relates to novel oligonuclectides comprising several nucleotide units which are specifically hybridisable with a selected sequence of RNA or DNA wherein at least one of the nucleotic moieties of the oligomer is modified to include a guanidinium group. These oligonucleotides are useful for diagnostic, therapeutic and investigative purposes. The present sequence is an oligonucleotide us in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         11-MAR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADG47994 standard;
                                                                                                                                                                                                                                                              New oligomers containing guanidinium groups, useful for modulating expression by hybridizing oligomer with single- or double-stranded
                                                                                                                                                                                                                                                                                      WPI; 2004-031184/03.
                                                                                                                                                                                                                                                                                                    Manoharan M,
                                                                                                                                                                                                                                                                                                                                                          07-JUL-1999;
07-JUL-2000;
                                                                                                                                                                                                                                                                                                                                                                                20-SEP-2002; 2002US-00247893
                                                                                                                                                                                                                                                                                                                                                                                                15-MAY-2003.
                                                                                                                                                                                                                                                                                                                                                                                                               US2003092046-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                    modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Hybridisation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADG47994;
               Oligonucleotide
                                                                                                                                                                                                                                         Example 26; SEQ ID NO 3; 54pp; English
                                                                                                                                                                                                                                                                                                                            (MANO/)
(COOK/)
(PRAK/)
Hybridisation; diagnosis; therapeutic;
                                                                                                                                                             Sequence
                              11-MAR-2004
                                             ADG48004;
                                                           ADG48004 standard;
                                                                                                                                                                                                                                                                                                                     (MOHA/)
                                                                                                                427
                                                                                                                               17;
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                                                                                                                                                                                                                                                                                                                     MOHAN V.
                                                                                                                                                                                                                                                                                                                            COOK P D.
PRAKASH T P.
                                                                                                                                                                                                                                                                                                                                          MANOHARAN M.
                                                                                                                                      Similarity
                                                                                                           TTTTTATTTTATTTTTTT 445
                                                                                                                                                              19
                                                                                                 TTTTTTTTTTTTTTTTT 19
                                                                                                                                                             BP; 0
                                                                                                                               Conservative
                                                                                                                                                                                                                                                                                                                                                          2000US-00612531
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                                                                                                                                                                                                                                                                                                     Cook PD,
                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           diagnosis; therapeutic; investigation;
                                                                                                                                                                                                                                                                                                                                                                  99US-00349040
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          #3
               #11 used
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Location/Qualifiers
16. .19
                                                                                                                                                                                                                                                                                                                                                                                                                             note= "2'-0-{2-(guanidinium)ethyl] thymidine"
                                                                                                                                                             A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA; 19
                                                             DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         entry)
                                                                                                                                      1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                      base= OTHER
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                                                             19
                                                                                                                                                                                                                                                                                                      Prakash
                'n
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                                                             ВÞ
                                                                                                                              0;
               the
                                                                                                                               Score 15.8; D
Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          exemplification of the invention.
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                exemplification
                                                                                                                                                                                                                                                                                                      Mohan
investigation;
                                                                                                                                      DB 1;
.7e+03;
                of,
                                                                                                                                              Length
                                                                                                                                Indels
               the invention
                                                                                                                                                                                     oligonucleotide used
                                                                                                                                                                                                            nucleotide
                                                                                                                               0;
                                                                                                                               Gaps
                                                                                                                                                                                                                                                                       gene
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   RESULT 1801
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Query Match
Best Local S
Matches 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New oligomers containing expression by hybridizing nucleic acids.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              selected sequence of RNA or DNA wherein at least one of the nucleotide moieties of the oligomer is modified to include a guanidinium group. These oligonucleotides are useful for diagnostic, therapeutic and investigative purposes. The present sequence is an oligonucleotide used investigative purposes.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    07-JUL-1999; 99US-00349040
07-JUL-2000; 2000US-00612531
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      20-SEP-2002; 2002US-00247893
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Key
modified_base
                                                                                                                 Oligonucleotide #5 used in the exemplification of the invention
                                                                                                                                                                                                                 ADG47998 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The present invention relates to novel oligonucleotides comprising several nucleotide units which are specifically hybridisable with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2004-031184/03.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-MAY-2003.
                                                   Synthetic
                                                                                    Hybridisation;
                                                                                                                                                  11-MAR-2004
                                                                                                                                                                                  ADG47998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (MANO/) MANOHARAN M.
(COOK/) COOK P D.
(PRAK/) PRAKASH T P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     the exemplification of the
                                                                                                                                                                                                                                                                                                                                                                   l Similarity
17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      MOHAN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     26; SEQ ID NO 13; 54pp; English.
                                                                                                                                                                                                                                                                                                                                   TTTTTATTTATTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                     BP;
                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                   (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Cook PD,
                                                                                    diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                   0 A; 0 C; 0 G; 19 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Location/Qualifiers
   Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /note=
19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        /note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          *tag=
                                                                                                                                                   entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 _base= OTHER
e= "2'-0-[2-(guanidinium)ethyl] thymidine"
                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          base=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    .se= OTHER
"2'-0-[2-(guanidinium)ethyl] thymidine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            σ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Prakash
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     guanidinium groups, useful for modulating yoligomer with single- or double-stranded
                                                                                    therapeutic;
                                                                                                                                                                                                                   BP.
                                                                                                                                                                                                                                                                                                                                                                   0;
                                                                                                                                                                                                                                                                                                    19
                                                                                                                                                                                                                                                                                                                                   445
                                                                                                                                                                                                                                                                                                                                                                                     Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     invention.
                                                                                                                                                                                                                                                                                                                                                                     Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mohan
                                                                                     investigation;
                                                                                                                                                                                                                                                                                                                                                                                     .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                      0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                      DB 1;
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    The present invention relates to novel oligonucleotides comprising several nucleotide units which are specifically hybridisable with a selected sequence of RNA or DNA wherein at least one of the nucleotide moieties of the oligomer is modified to include a guanidinium group. These oligonucleotides are useful for diagnostic, therapeutic and investigative purposes. The present sequence is an oligonucleotide used in the exemplification of the invention.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New oligomers containing guanidinium groups, useful for modulating expression by hybridizing oligomer with single- or double-stranded
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           07-JUL-1999; 99US-00349040.
07-JUL-2000; 2000US-00612531.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         20-SEP-2002; 2002US-00247893
                          07-JUL-1999;
                                                                                                                                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                            ss; guanidinium
2-0-guanidinium
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Guanidinium
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Example 26; SEQ ID NO 7; 54pp; English.
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                                                                      15-JUL-2003.
                                                                                                                           US6593466-B1
                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          25-MAR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADH42933;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ADH42933 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (MANO/) MANOHARAN M.
(COOK/) COOK P D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            PRAK/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ) COOK P D.
) PRAKASH T P.
) MOHAN V.
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17; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   acids.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  TTTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        functionalised oligonucleotide ISIS #109973.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.6%;
llarity 89.5%;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Cook PD,
                          99US-00349040
                                                                                                                                                                                                                                                                                                                                                                            functionalised nucleotide; guanidinium;
ethyl; increased binding affinity.
                                                                                                                                                                                                                                                   Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    /mod_base= OTHER
/note= "2'-O-[2-(guanidinium)ethyl] thymidine"
                                                                                                                                                                                                    _mod
                                                                                                                                                                                                                         *tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DNA;
                                                                                                                                                                                                 _base= OTHER
                                                                                                                                                                            "OTHER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             19
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Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        19
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                                                                                                                                                                          2-0-[2-(guanidinium)-ethyl] modified"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mohan V;
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ADH42931
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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Juanianium functionalized oligomers used for diagnostic, applications.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to a guanidinium functionalised nucleotide compounds. The guanidinium functionalised nucleotide compounds are used for preparation of oligomers useful for diagnostic, therapeutic and investigative applications. The 2-0-guanidinium ethyl modification increases binding affinity to a target. The present sequence represents guanidinium functionalised oligonucleotide.
                                                                                                                                                                                                                                                                            Synthetic.
                                                                                                                                                                                                                                                                                              ss; guanidinium
2-0-guanidinium
                                                                                                                                                                                                                                                                                                                               Guanidinium functionalised oligonucleotide ISIS #109990
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 26; SEQ ID NO 5; 40pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2004-118052/12
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               07-JUL-1999;
                                     New guanidinium functionalized oligomers used for diagnostic,
                                                                                                                                                                                                                                             modified_base
                                                                                                                                                                                                                                                                                                                                                   25-MAR-2004
                                                                                                                                                                                                                                                                                                                                                                       ADH42931;
                                                                                                                                                                                                                                                                                                                                                                                          ADH42931 standard;
                          applications.
                                                                    WPI; 2004-118052/12.
                                                                                                                               07-JUL-1999;
                                                                                                                                                    07-JUL-1999;
                                                                                                                                                                                             US6593466-B1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (ISIS-) ISIS
                                                                                        Manoharan M,
                                                                                                            (ISIS-) ISIS
                                                                                                                                                                         15-มีนั้น-2003.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                427
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                                                                                                             PHARM INC
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                                                                                        Cook
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                                                                                                                               99US-00349040.
                                                                                                                                                    99US-00349040.
                                                                                                                                                                                                                                                                                                 ethyl; increased binding
                                                                                                                                                                                                                                                                                                          functionalised nucleotide;
                                                                                                                                                                                                                           /mod
                                                                                                                                                                                                                                                        Location/Qualifiers
                                                                                                                                                                                                                 note= "OTHER
                                                                                       PD,
                                                                                                                                                                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                                                                                                                                                                                   entry)
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                                                                                                                                                                                                                          base= OTHER
                                                                                                                                                                                                                                                                                                                                                                                            19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Prakash
                                                                                        Prakash
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 15.8; DB 1; Pred. No. 1.7e+03;
                                      nucleotide compounds useful for preparing therapeutic and investigative
                                                                                                                                                                                                                = 2-0-[2-(guanidinium)-ethyl] modified"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    nucleotide compounds useful for preparing therapeutic and investigative
                                                                                    TP,
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                                                                                                                                                                                                                                                                                                  e; guanidinium; affinity.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Length
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Example 26; SEQ

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40pp;

English

888888¥&

The invention relates to a guanidinium functionalised nucleotide compounds. The guanidinium functionalised nucleotide compounds are used for preparation of oligomers useful for diagnostic, therapeutic and investigative applications. The 2-O-guanidinium ethyl modification increases binding affinity to a target. The present sequence represents guanidinium functionalised oligonucleotide.

RESULT 1804 ADH42932

ADH42932 standard;

DNA;

19

ss; guanidinium 2-O-guanidinium

Guanidinium 25-MAR-2004 ADH42932;

(first entry)

functionalised oligonucleotide ISIS #109989

functionalised nucleotide; guanidinium; ethyl; increased binding affinity.

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Н

19

Matches Query Match Best Local

Similarity

1.6%; 0

Score 15.8; Pred. No. 1

1.7e+03;

Length 19;

Indels

0

0

Conservative

<u>.</u>

Mismatches

427

TTTTTATTTTTTTTT 445

Sequence

19

BP; 0

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C; 0

G; 19

Ţ,

0 U;

0 Other; DB 1;

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The invention relates to a guanidinium functionalised nucleotide compounds. The guanidinium functionalised nucleotide compounds are for preparation of oligomers useful for diagnostic, therapeutic and investigative applications. The 20-guanidinium ethyl modification increases binding affinity to a target. The present sequence represquantidinium functionalised oligonucleotide.
                                                                                                                                                                                                               07-JUL-1999;
                                                                                                                                                                                                                                 15-JUL-2003.
                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                  modified_base
                                                                                                                                                                                                                                                                                                                                                              Synthetic.
                                                                                                                    New guanidinium
                                                                                                                                                                                             07-JUL-1999;
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Sequence
                                                                               Example 26; SEQ ID NO
                                                                                                  applications
                                                                                                                                                        Manoharan M,
                                                                                                                                      2004-118052/12
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 BP;
                                                                                                                                                                           PHARM INC
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A;
                                                                                                          functionalized for diagnostic,
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/mod_base= OTHER
/----- "OTHER =
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17
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 0 C; 0 G;
                                                                               4; 40pp; English.
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HER =
                                                                                                          nucleotide compounds useful for preparing therapeutic and investigative
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                                                                                                                                                                                                                                                                                                         2-O-[2-(guanidinium)-ethyl] modified"
 T; 0 U;
                                                                                                                                                          Mohan
 0 Other;
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                                                      compounds are used
                           represents
                                                and
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Query Match

1.68:

Score 15.8;

DB 1;

Length 19;

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19

RESULT 1806 ADI12546/c

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ADH76758/c
ID ADH76
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Matches 17; Conserv
                                                                                                                    The invention relates to a novel diagnostic polynucleotide composition. The polynucleotide composition comprises: a sequence encoding a polypeptide with defined sequences given in the specification; a sequence capable of hybridizing to a melanin-concentrating hormone receptor 1 (MCHR1) gene; a polynucleotide encoding an MCHR1 polypeptide; or a sequence comprising one or more of the nucleotide exchanges (SNP's) given in the specification and at least 8 bases of surrounding sequence of the MCHR1 gene. The composition has anorectic activity. The polynucleotide composition may be used in gene therapy to treat the disorders of the invention. The composition is useful for diagnosing obesity related to the presence of a molecular variant of the MCHR1 gene or a susceptibility to the disorder. The MCHR1 protein or polynucleotide is useful for preparing a medicament for treating or preventing obesity related to the presence of a molecular variant of the MCHR1 gene. This polynucleotide is presence of a molecular variant of the MCHR1 gene. This polynucleotide
                                        Query Match
Best Local
                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                melanin-concentrating hormone receptor 1; MCHR1;
obesity; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .05-JUN-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         MCHR1 genomic sequence analysis primer #67.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADH76758;
                                                                                                                                                                                                                                                                                                                                                                              New diagnostic composition, use presence of a molecular variant
                                                                                                                                                                                                                                                                                                                                                                                                                                                     Platzer M,
Reichwald
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        05-JUN-2002; 2002EP-00012569
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                                                                                 Sequence 19
                                                                                                                                                                                                                                                                                                                                          Example
                                                                                                                                                                                                                                                                                                                                                                    the disorder.
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                                                                                                            represents an MCHR1 primer of the invention.
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  797
                                          Similarity
                                                                                                                                                                                                                                                                                                                                          2; Page 43; 76pp;
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  CACCATGTTCGCCAGGTTG 815
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Platzer C,
                                                                                   B₽;
                              Conservative
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                                                                                   4 A; 5 C; 5 G;
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                                        1.6%;
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ciant of
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                                          Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                   5 T; 0 U; 0 Other;
                                Mismatches
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MCHR1 gene
                                                          DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   anorectic; gene therapy;
                                                       Length 19;
                                                                                                                                                                                                                                                                                                                                                                                    obesity related to the or a susceptibility to
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ADJ59152
ID ADJ5
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AC ADJ5
XX
DT 06-N
XX
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                                                                                                                                        RESULT 1807
                                                                                                                                                                                                                                                                                                                                    This invention relates to a novel method for predicting a predisposition to cancer in a patient by detecting large deletions in the human tumour suppressor gene identified as the breast cancer susceptibility gene 1 (BRCA1). Specifically, it refers to deletions that result from the unequal crossover between a pair of repetitive Alu sequences in the BRCA1 gene, such that the recombined nucleotide sequence containing the celetion indicates a predisposition to breast and ovarian cancer. The present invention describes newly discovered deletion mutations that are believed to be deleterious and cause significant alterations in the structure or biochemical function of BRCA1. Accordingly, it provides methods for detecting such mutants, as well as identifying and screening for cytostatic compounds useful for treating or preventing cancers associated with a BRCA1 genetic variant. This polymucleotide is a mutant human BRCA1 genomic DNA fragment that arises as a result of a recombination event (deletion 4), which causes the omission of exons 16 crecombination in an exemplification of the invention.
                                                                                                                                                                                                                                               Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Predicting a predisposition to cancer in a patient comprising detecting deletion in the BRCA1 gene that results from the unequal crossover between a pair of repetitive sequences in the BRCA1 gene.
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                Oligonucleotide associated to
                                              06-MAY-2004
                                                                                                                                                                                                                                                                                                            Sequence
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09-AUG-2002; 2002US-0402430P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ds; cancer; human; tumour suppressor;
breast cancer susceptibility gene 1; BRCAl; repetitive Alu;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mutant human BRCA1 genomic DNA resulting from deletion 4 SeqID
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                                                                                                         ADJ59152 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Disclosure; SEQ ID NO 29; 59pp; English.
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17; Conserv
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                                                                                                                                                                                                                   TGGCTCACTGCAACCTCTG 689
                                                                                                                                                                                     TGGGTCACTGAAACCTCTG 1
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                                                                                                                                                                                                                                                                                                            BP; 5
                                              (first entry)
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Pred. No. 1.
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airway inflammation; allergy; asthma; impeded respiration;
cystic fibrosis; acute respiratory distress syndrome;
pulmonary hypertension; lung inflammation; bronchitis; oligonucleotide;
                                                                          of a subject an effective amount of an inhibitor. The uligonucleotide is useful for production of a medicament for the prevention and/or treatment of a respiratory or lung disease. The respiratory or lung disease is chosen from airway inflammation, allergy(les), asthma, impeded respiration, cystic fibrosis (CF), chronic obstructive pulmonary diseases (COPD), allergic rhinitis (AR), acute respiration, bronchitis, airway (ARDS), pulmonary hypertension, lung inflammation, bronchitis, airway
                                                                                                                                                                                                                       initiation codon, coding region with 2-10 nucleotides or 5'-end and 3'-end of nucleic acid target comprising gene(s) chosen from e.g. end of nucleic acid target comprising gene(s) chosen from e.g. interleukin (IL)-4 receptor, IL-5 receptor or salts of the oligonucleotide and optionally surfactant operatively linked to the oligonucleotide. The method is useful for preventing or treating a crespiratory or lung disease, which involves administering to the airways respiratory or lung disease, which involves administering to the airways respiratory.
                                                                                                                                                                                                                                                                                                                                                                                                    Claim 2;
                                                                                                                                                                                                                                                                                                                                                                                                                                              disease e.g., asthma.
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codons and introns of respiratory disease-relevant genes e.g., CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Nyce JW, Tang
Shahabuddin S,
                                                                                                                                                                                                                                                                                                                                       The present invention relates to an oligonucleotide anti-sense to e initiation codon, coding region with 2-10 nucleotides of 5'-end and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2004-203534/19.
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                                                           obstruction. The present sequence
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H, Cong H;
                                                                                                                                                                                                                                                                                                                                                                                                    English
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                                                             represents an
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                                                             oligonucleotide of the
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Sequence 19 BP; 2 A; 10 C; 3 G; 4 T; 0 U; 0 Other;

S 밁 Matches Query Match Local 885 CACCACGCCCGGCTTATTT 903 17; ۳, Similarity CACCACGCCCGGCTTCTCT Conservative 1.6%; 89.5%; <u>,</u> Score 15.8; Pred. No. 1 Mismatches .7e+03; DB 1; Length 19; Indels 0, Gaps

0

ADJ59153
ID ADJJ
XX
AC ADJ
XX
DT 06XX
Oli
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KW int
KW ain
KW es
KW pull Oligonucleotide 06-MAY-2004 ADJ59153, ADJ59153 standard; (first entry) associated DNA; 19 ç ВP IL 4R #8.

airway inflammation; allergy; asthma; impeded respiration; cystic fibrosis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; oligonucleotide; interleukin; IL-4 receptor; IL-5 receptor; lung disease;

e.g.,

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RESULT 1809
ADJ61646
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                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codons and introns of respiratory disease-relevant genes e.g., CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             29-JUL-2002; 2002US-0399076P
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                                                                                      interleukin; IL-4 receptor; IL-5 receptor; lung disease; airway inflammation; allergy; asthma; impeded respiration; cystic fibrosis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Nyce JW, Tang L, Sandrasagra A, Shahabuddin S, Lu H, Cong H;
                                                                                                                                                                   IL-4Ra receptor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 19
              WO2004011613-A2
                                            Synthetic.
                                                                                                                                                                                                  06-MAY-2004
                                                                                                                                                                                                                                                              ADJ61646
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                                                                                                                                                                                                                                                                                                                                                                                                        l Similarity
17; Conserv
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                                                                                                                                                                                                                                                                standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                             TCTGCCCGCCTCAGCCTCC 19
                                                                                                                                                                                                                                                                                                                                                                          TCTGCCTGCCTCGGCCTCC 857
                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 1
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                                                                                                                                                                                                                                                                BP.
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                                                                                                                                                                                                                                                                                                                                                                                                                        Score 15.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      G; 4 T; 0 U;
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                                                                                                                                                                                                                                                                                                                                                                                                                          .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Miller S;
                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 19;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            RESULT 1810
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The present invention relates to an oligonucleotide anti-sense to e.g., initiation codon, coding region with 2-10 nucleotides of 5'-end and 3'-end of nuclecic acid target comprising gene(s) chosen from e.g. interleukin (IL)-4 receptor, IL-5 receptor or salts of the oligonucleotide and optionally surfactant operatively linked to the oligonucleotide. The method is useful for preventing or treating a respiratory or lung disease, which involves administering to the airways of a subject an effective amount of an inhibitor. The oligonucleotide is
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 05-FEB-2004.
                                                                                                                                                                                                                                                                                                                                                          interleukin; IL-4 receptor; IL-5 receptor; lung disease; airway inflammation; allergy; asthma; impeded respiration; cystic fibrosis; acute respiratory distress syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                useful for production of a medicament for the prevention and/or treatment of a respiratory or lung disease. The respiratory or lung disease is chosen from airway inflammation, allerg(ies), asthma, impeded respiration, cystic fibrosis (CF), chronic obstructive pulmonary diseases (COPD), allergic rhinitis (AR), acute respiratory distress syndrome (ARDS), pulmonary hypertension, lung inflammation, bronchitis, airway (ARDS), pulmonary hypertension, lung inflammation, bronchitis, airway
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Nyce JW, Ta
Shahabuddin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 19
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                                                                                                                                                                                                                                                                                                                               pulmonary
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            IL-4Ra receptor #2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADJ61645;
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lin S,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                rerecereceresceree 857
                                                                                                                                                                                                                                                                                                                                  hypertension; lung inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       BP; 1 A; 11 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The present sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first
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H, Cong H;
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Pred. No. 1.7e+03
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                                                                                                                                                                                                                                                                                                                                           bronchitis; oligonucleotide;
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29-JUL-2002; 25-JUL-2003;

2002US-0399076P 2003WO-US023509

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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Nyce JW, Ta
Shahabuddin
New 2'-O-aminoethylthioethyl-modified ribosyl nucleosides useful a monomer for the synthesis of modified anti-sense oligonucleotides.
                                                                                                                                                                                                                                                                         07-AUG-1998;
06-AUG-1999;
                                                                                        WPI; 2004-106293/11.
                                                                                                                                                                                                                                                                                                                                                                    11-APR-2002; 2002US-00121135
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              antisense oligonucleotide; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2'-O-aminoethylthioethyl-modified ribosyl nucleoside;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Modified antisense oligonucleotide #5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   06-MAY-2004
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                                                                                                                                                                                                                (ISIS-) ISIS
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17; Conserv
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                                                                                                                                                 Z,
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                                                                                                                                                                                                                PHARM INC
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99US-00370625.
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H, Cong H;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA;
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Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               receptor of the
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RESULT 1812
ADJ77789
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XX ADJ7778
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Best Local &
                                                                                 The invention relates to 2'-O-aminoethylthioethyl-modified ribosyl nucleosides. The modified ribosyl nucleosides are used as monomers for the synthesis of modified antisense oligonucleotides, which are useful in diagnosis and therapeutics (e.g. in gene therapy, for treating organisms having a disease associated by the undesired production of proteins) and as research reagents. The oligonucleotides obtained from the monomers show enhanced hybrid binding affinity towards targeted DNA or RNA and resistance towards nucleases. This sequence represents a modified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          nucleosides. The modified ribosyl nucleosides are used as monomers for the synthesis of modified antisense oligonucleotides, which are useful ir shapposis and therapeutics (e.g. in gene therapy, for treating organisms having a disease associated by the undesired production of proteins) and as research reagents. The oligonucleotides obtained from the monomers show enhanced hybrid binding affinity towards targeted DNA or RNA and resistance towards nucleases. This sequence represents a modified antisense oligonucleotide of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                               New 2'-0-aminoethylthioethyl-modified ribosyl nucleosides useful as monomer for the synthesis of modified anti-sense oligonucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  07-AUG-1998;
06-AUG-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          US6673912-B1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Modified antisense
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             06-MAY-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADJ77789 standard; DNA; 19 BP
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                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; SEQ ID NO 26; 26pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              11-APR-2002; 2002US-00121135.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            06-JAN-2004.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2'-0-aminoethylthioethyl-modified ribosyl nucleoside;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADJ77789;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (ISIS-) ISIS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           427
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                                                              oligonucleotide
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cook PD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  98US-00130566.
99US-00370625.
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Pred. No. 1.
                                                                 This sequence represents a modified the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          .7e+03;
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Query Match Best Local Similarity

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Score 15.8; DB 1; Pred. No. 1.7e+03;

Length 19;

Sequence 19

BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;

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ADM42087
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                                                                                                                                                                                                                                                                                                                                                                               nanotube; (2) physically modifying (M2) a nanotube; (3) linking (M3) nanotubes; (4) a several linked nanotubes (II) produced by (M3); (5) directing (M4) nanotubes to specific targets; (6) a nucleic acid sensor (III) comprising (I), where the base sequence of the attached nucleic acid molecule is substantially complementary to all or a portion of the base sequence of the nucleic acid molecules being detected; (7) a DNA array consisting of an array of groups of one or more nanotubes, each group having one or more nucleic acid molecules of the same base sequence
used as a biosensor for detecting complementary musers bacterial or useful in clinical application for screening presence of bacterial or viral nucleic acid, in pharmaceutical applications, agricultural applications, food control, hygiene and environmental monitoring and forensic applications. (II) is useful as a nano-scale conductor or semiconductor, more specifically as a component in nano-electronic applications, as a replacement for damaged nerves in prostatic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   nanotube; nucleic acid sensor; DNA array; conductor; nanoparticle; biosensor; detection; screening; bacterial; viral; pharmaceutical; agricultural; food control; hygiene; environmental; forensic; nano-scale conductor; semiconductor; nano-electronic; prostatic nerve;
                                                                                                                                                                                                                                                                            attached to each nanotubes in the group, and where the base sequence of the nucleic acid molecules, attached to the nanotubes in one group differs from those in other groups so that a number of different target DNA molecules may be detected; (8) an actuator comprising (I) and a membrane support to which the DNA-modified nanotubes are attached; and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The present invention describes a nanotube (I) attached with one or more nucleic acid molecule(s). Also described: (1) chemically modifying (M1) concerns. (2) physically modifying (M2) a nanotube; (3) linking (M3)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Carbon nanotube attached with one or more nucleic acid molecules, as biosensor for screening presence of bacterial or viral nucleic
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                                                                                                                                     (9) a conductor (IV) comprising (1) (1) is useful in coating one or manotubes with nanoparticles, which involves exposing (1) to nanoparticles comprising several attached complementary nucleic acid molecules, where the nanoparticles hybridise to the nucleic acid molecules on the surface of the nanotube(8) as well as self-annealing other nanoparticles, forming one or more coated nanotubes. (1) can be used as a biosensor for detecting complementary nucleic acid strands,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Page 91; 147pp; English.
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427

TTTTTATTTTTTTTTTT

Query Match Best Local S Matches 17

1 Similarity

Conservative

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1.6%;

Score 15.8; D Pred. No. 1.7e 0; Mismatches

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  applications, or as the bio-electronic interface in bio-electronic devices. (II) can also be used as a transistor or gated device. The present sequence represents an oligonucleotide which is used in an example from the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADM47150;
                   The invention relates to nucleoside compounds. The nucleoside compounds are useful as antisense compounds in diagnostics, therapeutics, prophylaxis, and as research reagents and kits, and to prevent or delay infection, inflammation or tumour formation. The compounds have enhanced binding affinity properties. The present sequence represents a 2'-O-MOE, thio modified oligonucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                      ss; antisense; infection; enhanced binding affinity.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           2'-O-MOE-2-thio modified oligonucleotide
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                                                                                                                                                                                                                                                                                                                                                                                               modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic.
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                                                                                                    Example
                                                                                                                           New nucleoside compounds useful as antisense compounds to prevent delay e.g. infection, inflammation or tumor formation.
                                                                                                                                                                                   Manoharan M,
                                                                                                                                                                                                         (MANO/) MANOHARAN M.
(PRAK/) PRAKASH T P.
(RAJE/) RAJEEV K G.
                                                                                                                                                                                                                                                        16-AUG-2002; 2002US-00222588
                                                                                                                                                                                                                                                                                16-AUG-2002; 2002US-00222588
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                                                                                                    211; SEQ ID NO 17; 96pp; English
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                                                                                                                                                                                   Prakash
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/mod_base= OTHER
/note= "OTHER = 2'-O-[2-(methoxy-)ethyl]-2-thio-5-
methyluridine"
                                                                                                                                                                                                                                                                                                                                                                                                Location/Qualifiers
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  0 Other;
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                                    represents a 2'-O-MOE-2
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                                                                                                                                          Query Match
Best Local S
Matches 17
           AD058942
                                                                                                                                                                                                                                                             The invention relates to 2'. O-modified ribosyl nucleosides and methods enhancing renal uptake of an oligomeric compound. The method is useful for enhancing renal uptake of an oligomeric compound. The sequences of the invention are useful in diagnostics, therapeutics and as research
                                                                                                                                                                                                                                                                                                                                                Enhancing renal uptake of an oligomeric compound in the diagnostic and therapeutic applications involves incorporating at least one modified ribosyl nucleoside into the oligomeric compound.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Oligonucleotide #4 used in animal studies
                                                                                                                                                                                          Sequence 19
                                                                                                                                                                                                               reagents; and for treating infection caused by organisms (e.g. bacte. yeast, protozoa and algae) in plants and higher animals. The present sequence is an oligonucleocide used in animal studies. This sequence used to illustrate the method of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Unidentified.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADO58963;
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                                 ADO58942 standard;
                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2004-201317/19.
                                                                                                                                                                                                                                                                                                                                                                                                                        Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   07-AUG-1998;
06-AUG-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      06-FEB-2003; 2003US-00359328
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      US2004009938-A1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Renal uptake enhancement; therapy; infection;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                (MANO/) MANOHARAN M. (COOK/) COOK P D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              15-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         modified_base
                                                                                                                   427
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                                                                                                                                                        Similarity
                                                                                                                                                                                                                                                                                                                           19; SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ||||| |||| ||||||| 19
                                                                                                                   TTTTTATTTTTTTT 445
                                                                                                                                                                                          BP; 0
                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first
                                                                                                                                                                                                                                                                                                                                                                                                                        Cook PD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  98US-00130566
99US-00370625
                                                                                                                                                                                                                                                                                                                          ID NO 26; 21pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /note= "Modified with 2'-0-[2-(2-N,N-dimethylaminoethyl)
oxyethyl]-5-methyl uridine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   mod_base= OTHER
                                                                                                                                                                                        A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                 DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      entry)
                                                                                                                                                    1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     19
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                                 ВР
                                                                                                                                           <u>,</u>
                                                                                              19
                                                                                                                                          Score 15.8; DB 1;
Pred. No. 1.7e+03;
0; Mismatches 2
                                                                                                                                                                DB 1; Length 19;
                                                                                                                                           0
                                                                                                                                                                                                                                                   bacteria,
                                                                                                                                           Gaps
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RESULT 1817
ADO47036
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Oligo,
Human; 88; interleukin-4 receptor; IL-4; interleukin-5 receptor; IL-5; CCR1; CCR3; Eotaxin-1; RANTES; MCP4; CD23; ICAM; VCAM; tryptase a; tryptase b; PDE4 A; PDE4 B; PDE4 C; PDE4 D; respiratory disease; lung disease; hyper-responsiveness; adenosine; adenosine A receptor; asthma; lung allergy; inflammation; inflammatory disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to 2'-O-modified ribosyl nucleosides and methods of enhancing renal uptake of an oligomeric compound. The method is useful for enhancing renal uptake of an oligomeric compound. The sequences of the invention are useful in diagnostics, therapeutics and as research reagents; and for treating infection caused by organisms (e.g. bacteria, yeast, protozoa and algae) in plants and higher animals. The present sequence is an oligomucleotide used to illustrate enzymatic degradation of 2'-O-modified oligomers. This sequence is used to illustrate the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 19 BP; 0 A; 0 C; 0 G; 19 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Enhancing renal uptake of an oligomeric compound in the diagnostic and therapeutic applications involves incorporating at least one modified ribosyl nucleoside into the oligomeric compound.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Manoharan M, Cook PD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   US2004009938-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-JUL-2004
                                                                                                                                                                                      15-JUL-2004
                                                                                                                                                                                                                                                                                   ADO47036 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Example 19; SEQ ID NO 5; 21pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2004-201317/19.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (MANO/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                07-AUG-1998;
06-AUG-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    06-FEB-2003; 2003US-00359328
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           modified_base
                                                                                                                                        Human oligonucleotide #2402.
                                                                                                                                                                                                                                     ADO47036;
                                                                                                                                                                                                                                                                                                                                                                                                                                                 427
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            uptake
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                                                                                                                                                                                                                                                                                                                                                                                                      μ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              MANOHARAN M.
COOK P.D.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                   TTTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                   TTTTTTTTTTTTTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              enhancement;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                98US-00130566.
99US-00370625.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               methoxyethyl or DMAEOE"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       /mod_base= OTHER
/note= "Optionally 2'-O-modified with propyl,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Location/Qualifiers
                                                                                                                                                                                                                                                                                   DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                                                                                                                                                                   19
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                                                                                                                                                                                                                                                                                   ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             0
                                                                                                                                                                                                                                                                                                                                                                                                      19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Length 19;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Gaps
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The invention relates to oligonucleotides anti-sense to an initiation cc codon, coding region, 5' or 3' intron-exon junction, intron or region cc with 2-10 nucleotides of the 5'-end or 3'-end of a nucleic acid target chosen from a gene encoding interleukin (IL) 4 receptor, interleukin (IL) 5' receptor, CCR1, CCR3, Ectaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, CC tryptase a, tryptase b, PDE4 A, PDE4 B, PDE4 C or PDE4 D. The invention CC also relates to a method of screening a candidate compound that binds to come or more nucleic acid target(s) or expressed product(s), for the CC oligonucleotides are useful for reducing or inhibiting expression of a CC gene or mRNA encoding interleukin-4 receptor, interleukin-5 receptor, CC CCR1, CCR3, Ectaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a, CC tryptase b, PDE4 A, PDE4 B, PDE4 C, or PDE4 D. The oligonucleotides are useful for preventing or treating a respiratory or lung disease. The CC cand/or increased levels of, adenosine and/or levels of adenosine A CC receptor(s), and/or asthma and/or lung allergies associated with cc inflammation or an inflammatory disease. The respiratory or lung disease (CP), chronic obstructive pulmonary disease (COPD), callergic rhinitis, acute respiratory diseases syndrome, pulmonary controloconstriction. This sequence represents an oligonucleotide of the
                                                                                                               Query Match
Best Local
                                                                                           Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         airway inflammation; allergy; impeded respiration; cystic fibrosis; CF chronic obstructive pulmonary disease; COPD; allergic rhinitis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; airway obstruction; bronchoconstriction
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codon, intron of respiratory disease-relevant gene e.g. CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory disease e.g.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Nyce JW, Si
Shahabuddin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           23-APR-2002;
23-APR-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example 5; Page 163; 174pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2004-293804/27.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (NYCE/)
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                                                                                                                                                                                      Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (SHAH/)
                                           885
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      CONG
H
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TANG L.
AGUILAR D.
                                                                                                               Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               MILLER S.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      SANDRASAGRA A.
                      CACCACGCCCGGCTTATTT
                                                                                                                                                                                      19
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in S, Lu H,
                                                                                                                                                                                      BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           2002WO-US013135.
2002WO-US013143.
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Cong
                                                                                                               1.6%;
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                                                                                                                                                                                      C; 3
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ong H;
                                                                                        0,
                                                                                                                                                                                      G; 4
19
                                             903
                                                                                                                    Score 15.8;
Pred. No. 1
                                                                                             Mismatches
                                                                                                                                                                                      T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Aguilar
                                                                                                                    .7e+03
                                                                                                                                              DB 1;
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                                                                                                                                      Length 19;
                                                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             fibrosis; CF
                                                                                             0,
                                                                                           Gaps
                                                                                             0,
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RESULT 1818
         The invention relates to oligonucleotides anti-sense to an initiation codon, coding region, 5' or 3' intron-exon junction, intron or region CC with 2-10 nucleotides of the 5'-end or 3'-end of a nucleic acid target CC chosen from a gene encoding interleukin (II)-4 receptor, interleukin (II)-5 receptor, CCR1, CCR3, Eotaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, CC tryptase a, tryptase b, PDE4 A, PDE4 B, PDE4 C or PDE4 D. The invention CC also relates to a method of screening a candidate compound that binds to one or more nucleic acid target(s) or expressed product(s), for the CC one or more nucleic acid target(s) or expressed product(s), for the CC prevention and/or treatment of a respiratory or lung disease. The CC coligonucleotides are useful for reducing or inhibiting expression of a CC gene or mRNA encoding interleukin-4 receptor, interleukin-5 receptor, CC CCR1, CCR3, Eotaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a, CC tryptase b, PDE4 A, PDE4 B, PDE4 C, or PDE4 D. The oligonucleotides are cuseful for preventing or treating a respiratory or lung disease. The CC and/or increased levels of, adenosine and/or levels of adenosine A CC receptor(s), and/or asthma and/or lung allergies associated with cc inflammation or an inflammatory disease. The respiratory or lung disease (CPD), chronic obstructive pulmonary disease (CPDD), called the pulmonary disease (CPDD), called the pulmonary disease condered the constitutive pulmonary and constitutive pulmonary and constitutive pulmonary and constitutive pulmonary disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; 88; interleukin-4 receptor; IL-4; interleukin-5 receptor; IL-1 (CR1; CCR3; Eotaxin-1; RANTES; MCP4; CD23; ICAM; VCAM; tryptase a; tryptase b; PD54 A; PD54 B; PD54 C; PD54 D; respiratory disease; lung disease; hyper-responsiveness; adenosine; adenosine A receptor; asthma; lung allergy; inflammation; inflammatory disease; airway inflammation; allergy; impeded respiration; cystic fibrosis; chronic obstructive pulmonary disease; COPD; allergic rhinitis; acute respiratory distress syndrome; pulmonary hypertension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADO44643;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ADO44643 standard; DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel single or multiple target oligonucleotide anti-sense to e.g. coinitiation codon, intron of respiratory disease-relevant gene e.g. Coranger, MCP4, useful for prophylaxis or treating respiratory disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
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                                                                                                                                                                                                                                                                                                                                                                                                             Claim 2; SEQ ID NO 9; 174pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (MILL,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (AGUI/
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   23-APR-2002;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          lung inflammation; bronchitis; airway obstruction; bronchoconstriction
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Shahabuddin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    23-APR-2002;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (SAND/)
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MILLER S.
SHAHABUDDIN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CONG H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              NYCE J W.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TANG L.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         SANDRASAGRA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sandrasagra
in S, Lu H,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2002WO-US013135
2002WO-US013143
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Ξ
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ng H;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Miller
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CCR1,
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e.9

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invention.

Sequence 19

BP; 1 A;

11 C; 3 G; 4 T; 0 U; 0 Other;

hypertension, lung inflammation, bronchitis, airway obstruction or bronchoconstriction. This sequence represents an oligonucleotide of the

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ADO47037
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 Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human; 88; interleukin-4 receptor; IL-4; interleukin-5 receptor; IL-5; CCR1; CCR3; Eotaxin-1; RANTES; MCP4; CD23; ICAM; VCAM; tryptase a; tryptase b; PDE4 A; PDE8 B; PDE4 C; PDE4 D; respiratory disease; lung disease; hyper-responsiveness; adenosine; adenosine A receptor; asthma; lung allergy; inflammation; inflammatory disease; already; inflammatory disease; airway inflammation; allergy; impeded respiration; cystic fibrosis; CF chronic obstructive pulmonary disease; COPD; allergic rhinitis; acute respiratory distress syndrome; pulmonary hypertension;
The invention relates to oligonucleotides anti-sense to an initiation codon, coding region, 5' or 3' intron-exon junction, intron or region with 2-10 nucleotides of the 5'-end or 3'-end of a nucleic acid target chosen from a gene encoding interleukin (IL)-4 receptor, interleukin (IL)-5 receptor, CCR1, CCR3, Eotaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a, tryptase b, PDE4 A, PDE4 B, PDE4 C or PDE4 D. The invention
                                                                                                                                 Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codon, intron of respiratory disease-relevant gene e.g. CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory disease e.g.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human oligonucleotide #2403.
                                                                                                                                                                                                                                                                                                                                                                              23-APR-2002; 2002WO-US013135
23-APR-2002; 2002WO-US013143
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                                                                                             Example 5;
                                                                                                                                                                                         WPI; 2004-293804/27
                                                                                                                                                                                                                Shahabuddin
                                                                                                                                                                                                                             Nyce JW,
                                                                                                                                                                                                                                                                                                                                                                                                                     25-JUL-2003; 2003US-00627930
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         15-JUL-2004
                                                                                                                                                                                                                                                                                                                          (TANG/)
                                                                                                                                                                                                                                                                                                                                                     (NYCE/)
                                                                                                                                                                                                                                                                                     (SHAH/)
                                                                                                                                                                                                                                                                                                              (AGUI/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               inflammation; bronchitis; airway obstruction; bronchoconstriction
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                                                                                                                                                                                                                                                                                  AGUILAR D.
MILLER S.
SHAHABUDDIN S.
                                                                                                                                                                                                                                                         CONG H
                                                                                                                                                                                                                                                                                                                                                     NYCE J W.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                         TANG L.
                                                                                                                                                                                                                                                                                                                                      SANDRASAGRA A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              TCTGCCCGCCTCAGCCTCC 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TCTGCCTGCCTCGGCCTCC 857
                                                                                                                                                                                                                             Sandrasagra
                                                                                             Page 163;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         entry)
                                                                                                                                                                                                       A,
Cong
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                                                                                           174pp; English.
                                                                                                                                                                                                                            Tang
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Pred. No. 1.
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                                                                                                                                                                                                                             Aguilar
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                                                                                                                                                                                                                              'n
                                                                                                                                                                                                                                Miller
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Length 19
                                                                                                                                    respiratory disease e.g.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
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RESULT 1820
ADO44642
ID ADO4464
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  CC also relates to a method of screening a candidate compound that binds to one or more nucleic acid target(s) or expressed product(s), for the CC prevention and/or treatment of a respiratory or lung disease. The CC oligonucleotides are useful for reducing or inhibiting expression of a CC cross and/or interleukin-4 receptor, interleukin-5 receptor, CC CCR1, CCR3, Eotaxin-1, RANTES, MCP4, CD23, ICAM, VCAM, tryptase a, CC tryptase b, PDE4 h, PDE4 B, PDE4 C, or PDE4 D. The oligonucleotides are CC useful for preventing or treating a respiratory or lung disease. The CC respiratory or lung disease is associated with hyper-responsiveness to C and/or increased levels of, adenosine and/or levels of adenosine A CC receptor(s), and/or asthma and/or lung allergies associated with CC inflammation or an inflammatory disease. The respiratory or lung disease C schosen from airway inflammation, allergy, asthma, impeded respiration, CC cystic fibrosis (CF), chronic obstructive pulmonary disease (CPD),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local S
Matches 17
                                                                                                                                                                                                                                                                                                                                                                              Human; ss; interleukin-4 receptor; IL-4; interleukin-5 receptor; IL-5; CCR1; CCR3; Eotaxin-1; RANTES; MCP4; CD23; ICAM; VCAM; tryptase a; tryptase b; PDB4 A; PDE4 B; PDB4 C; PDE4 D; respiratory disease; lung disease; hyper-responsiveness; adenosine; adenosine A receptor; asthma; lung allergy; inflammation; inflammatory disease; airway inflammation; allergy; impeded respiration; cystic fibrosis; CF; chronic obstructive pulmonary disease; CODD; allergic rhinitis; acute respiratory distress syndrome; pulmonary hypertension; lung inflammation; bronchitis; airway obstruction; bronchoconstriction.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           allergic rhinitis, acute respiratory distress syndrome, pulmonary hypertension, lung inflammation, bronchitis, airway obstruction or
              Nyce JW, Sandrasagra A, Ta
Shahabuddin S, Lu H, Cong
                                                                                                                                        (NYCE/)
(SAND/)
(TANG/)
                                                                                                                                                                                                          23-APR-2002; 2002WO-US013135.
23-APR-2002; 2002WO-US013143.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human oligonucleotide #8.
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                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                      25-JUL-2003; 2003US-00627930.
                                                                                                                                                                                                                                                                                     11-MAR-2004.
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                                                                                             SHAH/
                                                                                                                            AGUI/
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    839
                                                           AGUILAR D.
MILLER S.
SHAHABUDDIN
LU H.
CONG H.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                         SANDRASAGRA
TANG L.
                                                                                                                                                                         NYCE J W.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TCTGCCTGCCTCGGCCTCC 857
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA; 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.6%;
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                Tang
ong H;
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              T; 0
                               Aguilar D,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0 Other;
                                Miller
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WPI; 2004-293804/27

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RESULT 1821
ADP08673/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cc also relates to a method of screening a candidate compound that binds to come or more nucleic acid target(s) or expressed product(s), for the crewition and/or treatment of a respiratory or lung disease. The cc prevention and/or treatment of a respiratory or lung disease. The cc oligonucleotides are useful for reducing or inhibiting expression of a creat control of a control of the control of a control of a control of a control of the co
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Novel single or multiple target oligonucleotide anti-sense to e.g. initiation codon, intron of respiratory disease-relevant gene e.g. CCR1, RANTES, MCP4, useful for prophylaxis or treating respiratory disease e.g.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates codon, coding region,
                                                                                                                                                                                                                                                                                                                                           breast cancer; cytostatic; gene therapy; human; platelet glycoprotein GP6; GPIV; GPVI; chromosome 19q13.4; ss; PCR; primer; SNP; single nucleotide polymorphism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       bronchoconstriction. This sequence represents an oligonucleotide of the
                                                                                                                                                                                                                                                                                                Homo sapiens
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADP08673 standard;
                                                                                                                                                                                                                                                    WO2004047767-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                       Extend primer
Roth RB
                                                                                       25-NOV-2002;
24-JUL-2003;
                                                                                                                                                             25-NOV-2003; 2003WO-US037966.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               885 CACCACGCCCGGCTTATTT 903
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17; Conserv
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Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP;
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                                                                                       2002US-0429136P.
2003US-0490234P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                     10 used to genotype human glycoprotein VI polymorphism
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                                             INC.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DNA;
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89.5%;
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Braun
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.8; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
Kammerer
, MS
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Reneland
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 19;
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RESULT 1822
AD059136
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Best Local S
Matches 17
                                                                                                                                                                                                                                                                    11-JAN-2002;
12-MAR-2002;
10-JAN-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human glycoprotein VI (platelet) (GP6; GPIV;GPVI) DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Identifying a subject at risk of breast cancer by detecting or absence of one or more nucleotide polymorphic variations, diagnosing, preventing and/or treating breast cancer.
The invention relates to an isolated nucleic acid molecule (1), comprising a nucleic acid sequence chosen from 75 Nicotiana-derived cytochrome P450 enzyme fragment sequences. (I) is useful for producing a transgenic tobacco plant, which involves operably linking (I) with a promoter functional in the plant to create a plant transformation vector, and transforming the plant with the plant transformation vector,
                                                                                                                                                                                  WPI;
                                                                                                                                                                                                              Xu D;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention relates to a novel method for identifying
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2004-441082/41.
                                                                                                                            transgenic
                                                                                                                                         An isolated nucleic acid
Nicotiana derived cytochr
                                                                                                                                                                                                                                                                                                                                                                                     US2004117869-A1
                                                                                                                                                                                                                                                                                                                                                                                                                 Nicotiana
                                                                                                                                                                                                                                                                                                                                                                                                                                          ss; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tobacco cytochrome P450 PCR primer #6.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 09-SEP-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ADO59136;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADO59136 standard; DNA; 19
                                                                                                   Disclosure; SEQ ID NO 154; 82pp; English
                                                                                                                                                                                                                                                                                                                             12-MAR-2003;
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                                                                                                                                                                                                                                          (USSM-)
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17; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19
                                                                                                                            derived cytochrome plants.
                                                                                                                                                                                                                                           SMOKELESS TOBACCO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP;
                                                                                                                                                                                                                                                                   ; 2002US-0347444P.
; 2002US-0363684P.
; 2003US-00340861.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                             2003US-00387346
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                           cytochrome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
89.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           6 C;
                                                                                                                                         molecule,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           v
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                            P450; transgenic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         888
                                                                                                                                                                                                                                           8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                            enzyme
                                                                                                                                              comprising nucleic acid
enzyme fragments, useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                            tobacco;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      detecting the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    a subject at risk
                                                                                                                                           sequence of for producing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        the presence useful for
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RESULT 1823
ADIZ0573/c
ID ADIZ0577
XX ADIZ057
XX ADIZ057
XX DIIGONU
XX Human;
XX Homo sa
XX Tidentick
XX Homo sa
XX Homo sa
XX Tidentick
XX Tide
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                                                                                                        Query Match
Best Local S
Matches 26
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Best Local S
Matches 17
                                                                                                                                                                                                                                                               The present invention relates to identifying an eRNA or a DNA sequence comprising an eRNA-encoding sequence in the nucleome of a eukaryotic cell comprises identifying non-protein-encoding nucleotide sequences within an mRNA transcript or a DNA sequence encoding same in the nucleome. The methods are useful for identifying an eRNA or DNA for modifying a genetic network in cell to alter the cells phenotype. The present sequence represents human oligonucleotide sequence enquiry.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   regenerating a plant from the selected plant cell. The nucleic acid molecule is in an antisense orientation, sense orientation or is in a RNA interference orientation. The present sequence represents a PCR primer used to clone DNA encoding tobacco cytochrome P450 enzyme fragments of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 19 BP; 0
                                                                                                                                                                                                                 Sequence 60
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Oligonucleotide sequence enquiry #60
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Identifying an eRNA or a DNA sequence comprising an eRNA-encoding sequence in the nucleome of a eukaryotic cell, comprising identifying protein-encoding nucleotide sequences within an mRNA transcript or a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mattick J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19-SEP-2002; 2002WO-AU001286.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WO2003025229-A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADI20573 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (UYQU ) UNIV QUEENSLAND
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   19-SEP-2001; 2001US-0324127P
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                                                     619
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          427
43
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       -
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17; Conserv
                                                                                                           26;
                                                                                                                                        Similarity
                                                   TGAGACAGAGTCTCAACTCTGTCACCCAGGCTGGAGTGCAGTG 661
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       TTTTTTTTTTTTTTTT 19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TTTTTATTTATTTTTTT 445
TGAGCCAAGATCGCACCACTGCACTCCAGCCTGGGTGACAGAG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              a plant cell transformed with the transformation vector
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gagen M,
                                                                                                                                                                                                              BP; 8 A; 22 C; 16 G; 14 T; 0 U; 0 Other;
                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         SEQ ID NO 63; 137pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DNA;
                                                                                                                               1.6%;
60.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Stanley
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  60
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                                                                                                      Score 15.8; DI
Pred. No. 1.8e-
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          15.8;
No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.7e+03;
                                                                                                                                     .8e+03
                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      멂
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1;
                                                                                                        17;
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                                                                                                                                                              Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Indels
                                                                                                        Indels
                                                                                                                                                              60
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                                                                                                        Gaps
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RESULT 1824

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                                                                                                                                                                                                                                                         Query Match
Best Local
                                                                                                                                                                                                                                             Matches
                                                                                                                                                                                                                                                                                                                                        The invention relates to a method of identifying a subject at risk of melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence
                            Human SNP flanking oligonucleotide SEQ ID 1204.
                                                                                                                                                                                                                                                                                                    Sequence 18 BP; 1 A; 7 C; 3 G; 6 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Roth
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human presynaptic cytomatrix protein, PCLO,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADO56744;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADO56744 standard; DNA; 18 BP
Single nucleotide polymorphism; SNP; single nucleotide primer extension;
                                                         14-AUG-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 6; Page 105; 295pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2004-411721/38.
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23-JUL-2003; 2003US-0489703P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            melanoma associated polymorphic varia presynaptic cytomatrix protein; PCLO;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  12-AUG-2004
                                                                                      AAH38408;
                                                                                                                AAH38408
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                                                                                                                                                                                                                                                                                                                                represents a
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                                                                                                                                                                                                                 686 TCTGCCTCCCGGGTTCAA 703
                                                                                                                                                                                                                                             16;
                                                                                                                                                                                                                                                            Similarity
                                                                                                               standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Nelson MR,
                                                                                                                                                                                                                                             Conservative
                                                                                                                                                                                                                                                                                                                               human presynaptic
                                                        (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             human;
                                                                                                                                                                                                                                                         1.6%;
                                                                                                                DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ss; melanoma;
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                                                                                                                  51
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                                                                                                                                                                                                                                          1;
                                                                                                                                                                                                                                                          Pred. No.
                                                                                                                                                                                                                                                                        Score 15.6;
                                                                                                                                                                                                                                                                                                                                cytomatrix protein,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               variation;
PCLO; SNP;
                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Kammerer
                                                                                                                                                                                                                                                                                                    0 U; 1 Other;
                                                                                                                                                                                                                                                            1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   MS
                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      proximal SNP probe
                                                                                                                                                                                                                                                                      Length 18;
                                                                                                                                                                                                                                            Indels
                                                                                                                                                                                                                                                                                                                                present sequence PCLO, proximal pr
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                                                                                                                                                                                                                                                                                                                                probe.
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RESULT 1826
AAX10256/c
ID AAX1025
XX AAX1025
AC AAX1025
XX AC AAX1025
XX Z
DT 24-MAR-
XX DE Human b
XX
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking concludes of single nucleotide polymorphisms SNPs. The present invention concludes kits for determining the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a configuration sequence, the SNPE primer is used as a genotyping primer. The oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The coligonucleotides are useful for determining the presence, absence or conditions and for genotyping nucleic acid samples, for e.g. to cases by association analysis the genotypic trait suspected of being caused by one or more SNPs. Phenotypic trait include diseases e.g. cased by one or more SNPs. Phenotypic trait include diseases e.g. capammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular cystrophy, familial hypercholestervolaemia, polycystic kidney disease, osteogenesis imperfecta and acute intermittent porphyria. Phenotypic traits also include symptoms of or susceptibility to multifactorial configuration, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and configuration of the method is also useful in forensic investigations and configuration and configuration of the method is also useful in forensic investigations and configuration of the method is also useful in forensic investigations and configuration and configuration of the method is also useful in forensic investigations and configuration of the method is also useful in forensic investigations and configuration and configuration of the method is also useful in forensic investigations and configuration of the method is also useful in forensic investigations and configuration configuration of the method is also useful in forensic investigations and configuration of the method is also useful in featur
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 1; Page 56; 83pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2001-290930/30.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15-OCT-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
                       Human biallelic polymorphic marker
                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       paternity analysis. The present sequence represents a fragment of human
DNA flanking the site of a single nucleotide polymorphism
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (ORCH-) ORCHID BIOSCIENCES INC
                                                                       24-MAR-1999
                                                                                                                                                               AAX10256
                                                                                                                  AAX10256;
                                                                                                                                                                                                                                                                                                                      1032
                                                                                                                                                                                                                                                                             8
                                                                                                                                                                                                                                                                                                                                                                                                                                                              5
                                                                                                                                                               standard;
                                                                                                                                                                                                                                                                                                                      AGCTGGGATTACGGGCACCTGCCACCACCCCCGCTAATT 1071
                                                                                                                                                                                                                                                                           AGCCGGGCGTGGCAGGTGCCTGTAATCCCAGCTACTY 47
                                                                                                                                                                                                                                                                                                                                                                                                                                                              ₿P;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2000WO-US028436
                                                                       (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                              12
                                                                                                                                                                                                                                                                                                                                                                                                                                                              A; 11 C;
                                                                                                                                                               DNA;
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                                                                                                                                                                                                                                                                                                                                                                                         Score 15.6; DB Pred. No. 2e+03;
                                                                                                                                                                                                                                                                                                                                                                        Mismatches
                            downstream
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      familial hypercholesterolaemia;
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                                                                                                                                                                                                                                                                                                                                                                        15;
                          primer
                                                                                                                                                                                                                                                                                                                                                                                                                 Length
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                                                                                                                                                                                                                                                                                                                                                                                                                     51,
                                                                                                                                                                                                                                                                                                                                                                        0;
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polymorphism; biallelic; human;
detection; phenotypic typing; ch
                                                      treatment;
                                                                         autoimmune
sapiens
                                           phenotypic typing; characteristic; infection; here disease; cancer; inflammation; drug; therapy; medic marker; primer; 85.
                                                                               medicament;
                                                                                                hereditary;
                                                                                                                 disease,
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Synthetic

WO9820165-A2

WAX SOUND SOUND SERVING A SERVING SOUND SO 14-MAY-1998

05-NOV-1997; 97WO-US020313

06-NOV-1996; 96US-0030455P

(WHED) WHITEHEAD INST BIOMEDICAL

Lander ES, Wang á

New isolated nucleic acid segments from the human determining polymorphic forms for use in e.g. for testing or phenotypic typing for disease. forensics, paternity genome used for

Claim 16; Page 220; 310pp; English.

AAX09121-X10268 are allele-specific oligonucleotide primers used in the isolation of various biallelic polymorphic markers found in the human CC genome (represented in AAX10269-X12937). These primers can be used in a CC method for determining polymorphic forms in an individual for use in e.g. forensics, paternity testing or for phenotypic typing for diseases such CC as agammaglobulinemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CC dystrophy, Wiskott-Aldrich syndrome, Fabry's disease, familial CC hypercholesterolenia, polycystic kidney disease, hereditary the percholesterolenia, polycystic kidney disease, hereditary Spherocytosis, von Willebrand's disease, tuberous sclerosis, hereditary compensation, polycystic kidney disease, hereditary chaemorrhagic telangiectasia, familial colonic polyposis, Ehlers-Danlos cystem, osteogenesis imperfecta, acute intermittent porphyria, cautoimmune diseases, inflammation, cancer, diseases of the nervous system, infection by pathogenic microorganisms, and characteristics such CC system, infection by pathogenic microorganisms, and characteristics such CC system, appearance (e.g. baldness, obesity), strength, speed, CC endurance, fertility, and susceptibility or receptivity to particular corrections can also be used to produce medicaments for the treatment or receptivity are of such diseases. prophylaxis of **Buch** diseases

Sequence 17 BP; 3 A; 3 C; 8 G; 3 T; 0 U; 0 Other;

Matches Query Match Best Local (16; Similarity Conservative 1.6%; 0; Score 15.4; Pred. No. 1 Mismatches No. 1.6e+03 DB 1; Length Indels 17; 0, Gaps

0

á 밁 673 GCTCACTGCAACCTCTG 689 17 GCTCACTGCAACCTCCG ш

AAA22858

AAA22858 standard; RNA; 17

19-JUN-2000 (first entry)

Integrin subunit beta 3 substrate sequence SEQ ID NO:6084.

Human; aryl hydrocarbon nuclear transport; ARNT; TIB-2; angiogene integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozy hammerhead ribozyme; angiogenic factor; cytostatic; antiquatic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; apphthalmologic; antiinflammatory; antiarthritic; antipsoriatic; antipsoriat ophthalmologic;
dermatological; RNA cleavage; TIE-2; angiogenesis;

a7

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AAA22737
ID AAA2273
XX AAA2273
AC AAA2273
XX ID ID JUN-
XX INTEGRI
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17655 to AAA18355 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 to AAA19155 to AAA19222 represent their corresponding target sequences; AAA19233 to AAA19233 to AAA23501 to AAA21555 represent ribozyme sequences; CC AAA19233 to AAA23501 to AAA21555 represent ribozyme sequences; CC AAA19233 to AAA221501 to AAA21555 represent ribozyme sequences; CC AAA19233 to AAA221501 to AAA2155 represent ribozyme sequences; CC AAA21689 to AAA22168 represent their corresponding target sequences; CC AAA21689 to AAA22163 to AAA23363 to AAA23427 represent ribozymes of CC AAA21689 to AAA22165 and AAA23363 to AAA23142 represent ribozymes of CC AAA23422 represent their corresponding target sequences; The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are CC especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as coversed and other syndrome, and diseases related to the levels of ARNT, Tie-2, integrin subunit beta-3 or integrin subunit bera-3 or 
                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local
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                         Integrin subunit beta 3 substrate sequence SEQ ID NO:5963
                                                                      19-JUN-2000
                                                                                                                AAA22737
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                                                                                                                                                          AAA22737 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 17 BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                 842 GCCTGCCTCGCCTCCC 858
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                                                                                                                                                                                                                                                                                                                                                           1 Similarity
13; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                subunit alpha-6, or integrin subunit beta-3
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                                                                   (first entry)
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76.5%;
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Pred. No. 1.6e+03;
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RESULT 1829
AAA22829
ID AAA2282
XX
AC AAA2282

AAA22829 standard; RNA; 17

AAA22829

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CUGGGAUUACAGGCGCC 17

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                                                                                                                                                                               The present invention describes enzymatic nucleic acid molecules with RNA Cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17188 to AAA17560 and AAA17622 represent ribozyme sequences for ARNT, CC corresponding target sequences; AAA17685 to AAA19835 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA21961 and AAA21501 to AAA21555 represent ribozyme sequences; CC AAA19223 to AAA21563 and AAA21501 to AAA21555 represent ribozyme sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA21680 represent their corresponding target sequences; CC AAA21422 represent their corresponding target sequences; CC AAA23422 represent their corresponding target sequences; CC AAA23422 represent their corresponding target sequences; CC AAA23422 represent their corresponding target sequences; CC CAAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC cabbility of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are cspecially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as sequences, CC syndrome, of tuberous sclerosis, pot-wine stains, Sturge Weber collegences, CC and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                  Matches
                                                                           Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; anglogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; anglogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; anglotibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                 Sequence 17 BP; 3 A; 5 C; 6 G; 0 T; 3 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 54; Page 239; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Novel ribozymes for modulating the synthesis, expression and/or stability of an mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 1999-591315/50.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  27-MAR-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (RIBO-) RIBOZYME PHARM INC
                                                                        Local Similarity 82.4%;
  734 CTGGGACTACAGGCGCC 750
                                               14;
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                                                  Conservative
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                                               2
                                                                           Score 15.4;
Pred. No. 1.
                                                  Mismatches
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                                                                           1.6e+03
                                                                                                  DB 1;
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                                                                                               Length 17;
                                                    Indels
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19-JUN-2000

(first

Integrin subunit beta 3 substrate sequence

SEQ ID NO:6055

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                                                                                                  Query Match
Best Local :
                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin submit beta 3 gene, an integrin alpha 6 submit gene, or a Tie-2 gene. AAA1675 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17650 and AAA17625 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA192361 and AAA21501 to AAA21595 represent ribozyme sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and AAA21596 to AAA22475 and AAA23263 to AAA23342 represent ribozyme sequences for integrin subunit beta 3, and AAA23476 AAA23363, AAA23343 to AAA23343 to AAA23343 to AAA23343 to AAA23343 to AAA23343 sequences for integrin subunit beta 3, and AAA23476 to AAA23362, AAA233343 to AAA23343 represent ribozyme sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; AKMU; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot wine stain; Sturge Weber syndrome; tuberous sclerosis; pot wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                        AAA23422 represent their corresponding target sequences. The ribozymes the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; anglogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; anglogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND;
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                                                                                                                                                             Sequence 17
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                                         1002 AAGCGATTCTCCTGTCT 1018
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                                                                                 l Similarity
11; Conser
                                                                                                                                                                                                       subunit alpha-6, or integrin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Roberts E,
                                                                                                                                                               BP; 3
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                                                                                                    64.7%;
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                                                                                                      Pred. No. 1.
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                                                                                                                                                                  0 T; 5
                                                                              Mismatches
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                                                                                                                                                               U; 0 Other
                                                                                                                                                                                                           subunit beta-3
                                                                                                      1.6e+03;
                                                                                                                          DB 1;
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                                                                                                                        Length 17;
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                                                                                   Gaps
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RESULT 1830
AAA22832
CC cleaving activity, which specifically cleave RNA encoded by an aryl CC cleaving activity, which specifically cleave RNA encoded by an aryl CC gene, an integrin alpha 6 subunit gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tia-2 gene AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17685 to AAA16985 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA18985 to AAA19086 CC AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19154 represent ribozyme sequences for integrin alpha 6 subunit, and AAA2365 represent ribozyme cC AAA21595 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21595 to AAA21688 represent their corresponding target sequences; CC AAA21595 to AAA21688 represent their corresponding target sequences; CC AAA21695 to AAA22475 and AAA2363 to AAA2362 represent ribozyme sequence; CC AAA21695 to AAA22475 and AAA2363 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to CC AAA23422 represent their corresponding target sequences. The ribozymes of CC integrin subunit beta 3, integrin subunit alpha-6, or Tie-2. They are cited and corresponding target sequences. They are cegeially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as corresponding target sequences. Sugarome, Kippel-Trenaunay-Weber syndrome, Obler-Weber-Rendu syndrome, conductors, subunit alpha-6, or rice related conductors, subunit alpha-6 or cruca wulgaris, and other syndromes and disease related to the levels of ARMT, Tie-2, integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; 88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Integrin subunit beta 3 substrate sequence
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Matches Best Local

Similarity

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Score 15.4; Pred. No. 1. Mismatches

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                                                              Cleaving activity, which specifically cleave RNA encoded by an aryl chydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 cg gene, an integrin alpha 6 subunit gene, or a Tito-2 gene. AAA1675 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, cand AAA17168 to AAA17168 to AAA17623 to AAA17685 to AAA18385 and AAA19087 to C corresponding target sequences; AAA17685 to AAA18385 and AAA19086 cand AAA19154 represent ribozyme sequences for Tie-2, and AAA18385 and AAA19086 cand AAA19155 to AAA19222 represent their corresponding target sequences; AAA19154 represent ribozyme sequences for Tie-2, and AAA18385 to AAA19086 cand AAA19155 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences; AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences; AAA18385 to AAA21598 represent their corresponding target sequences; AAA21596 to AAA21588 represent their corresponding target sequences; AAA21595 to AAA21689 to AAA22363 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22376 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22376 to AAA23343 to AAA23422 represent their corresponding target sequences of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, corresponding target sequences of che invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially are related corresponding target sequences. The ribozyme sequence stability of an mRNA encoding angiogenic factor, especially are related macular degeneration (ARMD), inflammation, and arthritis, as well as chevascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, and other syndrome, oller weber-Rendu syndrome, and other syndrome, oller weber-Rendu syndrome, integrin subunit beta 5, integrin subunit beta 6 arthritis as well as cherosponders of the sequences of areas of a favor of the sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antigoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; ss. Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
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       The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC aAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17650 and AAA17655 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences, ACA17685 to AAA18385 and AAA19087 to CC AAA19155 to AAA19222 represent their corresponding target sequences, CC aAA19232 to AAA19222 represent their corresponding target sequences, CC aAA19223 to AAA21561 and AAA21561 to AAA21555 represent ribozyme CC AAA19223 to AAA21688 represent their corresponding target sequences, CC AAA21689 to AAA21688 represent their corresponding target sequences, CC AAA21689 to AAA21688 represent their corresponding target sequences, CC AAA21689 to AAA2168 represent their corresponding target sequences, CC CAA21689 to AAA2168 represent their corresponding target sequences, CC CAA21689 to AAA2168 represent their corresponding target sequences, CC CAA21689 to AAA2168 represent their corresponding target sequences. The ribozyme of CC caaa19222 represent their corresponding target sequences. The ribozymes of CC caaa1922476 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC cabacially used to treat cancer, diabetic retinopathy, age related CC especially used to treat cancer, diabetic retinopathy, age related CC especially used to treat cancer, diabetic retinopathy, age related concours of the invention and archine services of the invention of this course of the invention and archine services where the course course of the invention and archine services.
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Best Local Similarity
Matches 12; Conserv
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tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
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Sturge Weber
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       The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17563 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18985 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19886 to AAA19086 CC AAA19155 to AAA19222 represent their corresponding target sequences; CC CAA19155 to AAA19222 represent to AAA21501 to AAA21500 and CC CAA21596 to AAA21688 represent their corresponding target sequences; CC CAA21596 to AAA21688 represent their corresponding target sequences; CC CAA21689 to AAA22461 and AAA22363 to AAA23343 to CC CAA23422 represent their corresponding target sequences; CC CAA21689 to AAA22475 and AAA23263 to AAA23343 to CC CAA23422 represent their corresponding target sequences. The ribozymes of CC CAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or carefullity of an modula encoding the synthesis, expression and/or carefullity of an modula encoding the synthesis, expression and/or carefullity of an modula encoding the synthesis.
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Best Local S
Matches 10
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17 BP; 4 A; 1 C; 6
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; aryl hydrocarbon nuclear transport; ARWT; TIE-2; angiogeneeis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARWD;
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the invention as
stability of an
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mRNA encoding angiogenic factor,
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Pred. No. 1.
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RESULT 1834
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                                                                                                                                                                                                                                                                                                                                                                                                                             myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antirritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
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                                                                                                                                                                                                                                                  Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      hydrocarbon nuclear transport; ARNT; TIE-2; ang pha 6 subunit; integrin subunit beta 3; hairpin
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17563 and AAA17623 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18885 and AAA19087 to AAA19125 represent tribozyme sequences; and AAA19155 to AAA19223 to AAA19223 represent their corresponding target sequences for Tie-2, and AAA18386 to AAA19086 and AAA19223 to AAA192361 and AAA191501 to AAA21505 represent ribozyme sequences for Tie-3ranies for

to AAA21688

Claim

54; Page 245; 305pp; English.

Novel ribozymes for of an mRNA encoding

modulating the synthesis, an angiogenic factor

expression and/or stability

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AAA22739

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Matches 11
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The present invention describes enzymatic nucleic acid molecules with RN cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16755 to AAA17661 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17630 and AAA17633 to AAA17644 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to
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                                                                                                                                                                                                                                                                                             Claim
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                                                                                                                                                                                                                                                                                     Page 239;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Roberts E,
                                                                                                                                                                                                                                                                                                                                                             encoding
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larity 64.7%;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
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                                                                                                                                                                                                                                                                                                                                                             an angiogenic
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                  expression and/or stability
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 17 BP; 3 A; 2 C; 3 G; 0 T; 9 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                19-JUN-2000
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                                                                                                                                                                                                                                                                                                         WPI; 1999-591315/50.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               24-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              07-OCT-1999.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Kippel-Trenaunay-Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Integrin subunit beta 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAA22734;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                              RIBOZYME PHARM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CCGCTAATTTTTGTATT 1079
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                                                                                                                                                                                                                                                                                                                                                                                Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             41.2%;
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                                                                                                                                                                                                                                                                                                                                                                                    Jarvis T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      substrate sequence SEQ ID NO:5960.
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                                                                                                                                                                                                                                                                                                                                                                                    Coeshott
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl

Claim 54; Page 239; 305pp; English.

ribozymes

for

the

factors.

expression and/or stability

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RESULT 1837
AAA22826
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17562 represent ribozyme sequences for ARNT, and AAA17168 to AAA17563 to AAA17623 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to AAA19155 to AAA19227 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21501 to AAA20362 to AAA21500 and AAA21506 to AAA21688 represent their corresponding target sequences; AAA21506 to AAA21688 represent their corresponding target sequences; AAA21506 to AAA22476 and AAA23263 to AAA23362, AAA23343 to AAA23363 and AAA22476 to AAA23363 to AAA2363 to AAA2363
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; degree related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17 BP; 3 A; 7 C; 4 G; 0 T; 3 U; 0 Other;
   Novel of an
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                                                                                                     WPI; 1999-591315/50
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                                                                                                                                                                                                                                          (RIBO-) RIBOZYME PHARM INC.
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ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
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                                                                                                                                                                         Roberts
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
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Pred. No. 1.
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                                                                                                                                                                             'n
                                    expression and/or stability
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Pavco PA,

Roberts E,

Jarvis

H,

Coeshott

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Mcswiggen JA;

07-OCT-1999.

27-MAR-1998; 24-MAR-1999;

98US-0079678P 99WO-US006507

(RIBO-) RIBOZYME PHARM INC.

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AAA22859
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAA23422 represent their corresponding target sequences. The ribozymes the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                              Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammactory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
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                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                            Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Integrin subunit
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAA22859;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      992 TCCCGGGCTCAAGCGAT 1008
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             beta 3 substrate sequence SEQ ID NO:6085
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Pred. No. 1.6e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1;
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RESULT 1839
AAA22760
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Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                      Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antiportatic; ARMU; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl
                      24-MAR-1999;
                                                                      07-OCT-1999.
                                                                                                                                                                                                                                           myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               19-JUN-2000
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               CTCGGCCTCCCAAAGTG 264
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                      99WO-US006507.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               3 A; 6 C; 4 G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                               beta 3 substrate sequence SEQ ID NO:5986.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 modulating the synthesis, expression and/or stability an angiogenic factors.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl pydrocarbon nuclear transporter (ART) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ART, and AAA17168 to AAA17560 and AAA17623 to AAA18385 and AAA19087 to corresponding target sequences; AAA11684 represent their corresponding target sequences; AAA19685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA22322 represent their corresponding target sequences; AAA19154 to AAA23361 and AAA21501 to AAA21595 represent ribozyme sequences; AAA19233 to AAA2368 argressent their corresponding target sequences; AAA21898 to AAA21688 represent their corresponding target sequences; AAA21898 to AAA22475 and AAA23263 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA23465 to AAA23363, AAA23343 to AAA23465 to AAA22475 and AAA23465 to AAA23365 to AAA23665 to A
                                                                                                                                         AA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARWD), inflammation, and arthritis, as well as meovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and other syndrome
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                                                                                                      subunit alpha-6,
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                                                                                                      or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Coeshott C,
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               S
                                    Matches
                                             Query Match
Best Local Similarity
                395 CTGGGATTACAGGCGTG 411
                                    13;
1 CUGGGAAUACAGGCGUG 17
                                    Conservative
                                             1.6%;
                                    u
,
                                             Score 15.4;
Pred. No. 1.
                                     Mismatches
                                             .6e+03
                                                      DB 1;
                                                      Length 17;
                                    0
                                     Gaps
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0,

Sequence 17 BP; 4 A; 3 C; 7 G; 0 T; 3 U; 0 Other;

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RESULT 1840
AAA22834
                                          AAA22834 standard;
                                      AAA22834;
                                          RNA;
                                          17
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Integrin subunit beta 3 substrate sequence SEQ ID NO:6060

19-JUN-2000

(first entry)

myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; age related macular degeneration;

Homo sapiens

WO9950403-A2

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RESULT 1841
AAA22723
ID AAA2272
XX AAA2272
XX AAA2272
XX Integri
XX Integri
XX Integri
XX Human;
KW integri
XW integri
XW integri
XW integri
XW dermato
XW dermato
XW age real
XW myopic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               CC cleaving activity, which specifically cleave RNA encoded by an aryl color hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17622 represent ribozyme sequences for AAA17164 and AAA17561 to AAA17623 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 to AAA19123 to AAA20361 and AAA21501 to AAA21505 represent ribozyme corresponding target sequences; AAA17688 to AAA19223 to AAA20361 and AAA21501 to AAA21505 represent ribozyme corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA21675 and AAA23263 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA23476 to AAA22362, AAA23343 to CC AAA21689 to AAA21687 and AAA22476 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362, AAA23343 to CC CC AAA21689 to AAA21680 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC stability of an mRNA encoding angiogenic factor, especially ARRT, CC corresponding target sequences. The ribozymes of the invention (ARMD), inflammation, and arthritis, as well as corresponding target sequences. They are CC syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, candother syndrome, and diseases related to the levels of ARNT, Tie-2, integrin subunit shere?
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Query Match
Best Local
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Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiniflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 1999-591315/50
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                                                                                                                                                                                                                                                                                          AAA22723;
                                                                                                                                                                                                                                                                                                                                 AAA22723 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 17
                                                                                                                                                                                                   Integrin subunit beta 3 substrate sequence SEQ ID NO:5949
                                                                                                                                                                                                                                               19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1033 GCTGGGATTACGGGCAC 1049
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP; 4 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                               (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         4 C; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                describes enzymatic nucleic acid molecules with RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Jarvis T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             English.
                                                                                                                                                                                                                                                                                                                                     В₽
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         G; 0 T; 3 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 15.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         .6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mcswiggen JA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Length 17;
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AAA22966/ ID AAA22 XX AAA22 AC AAAA22 XX IIIte DX IIIte XX IIIte XX Humau KW integ KW hammm

19-JUN-2000 AAA22966;

(first

entry)

Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme;

cytostatic;

Integrin subunit beta 3 substrate sequence

SEQ ID NO:6192.

hammerhead ribozyme; angiogenic

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CUGCAACUUCUGCCUCC 17

0,

RESULT 1842

AAA22966 standard; RNA; 17

ВÞ

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CC hydrocarbon nuclear transporter (ARNY) gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA17675 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17661 to AAA17560 and AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC and AAA19155 to AAA19222 represent their corresponding target sequences; CC aAA19233 to AAA19222 represent their corresponding target sequences; CC AAA19233 to AAA21688 represent their corresponding target sequences; CC AAA19155 to AAA21688 represent their corresponding target sequences; CC AAA21696 to AAA21688 represent their corresponding target sequences; CC AAA21696 to AAA21698 represent their corresponding target sequences; CC AAA21699 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362, AAA23343 to CC AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC stability of an mRNA encoding angiogenic factor, especially ARNT, C integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are c especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as C meovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, C angiofibroma of tubercous sclerosis, pot-wine stains, Sturge Weber CC syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, integrin subunit barea, so ribrorin subunit barea, so ribr
                                                                            Matches
                                                                                                                                                Query Match
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                                                                                                                                                                                                                             Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 54; Page 238; 305pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel ribozymes for modulating the synthesis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 1999-591315/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Pavco
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           24-MAR-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (RIBO-) RIBOZYME PHARM
                                                                                                                                                                                                                                                                                                         integrin subunit alpha-6,
                                                                                                            госат
678 CTGCAACCTCTGCCTCC 694
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            mRNA encoding an angiogenic factors
                                                                        l Similarity
12; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Roberts E,
                                                                                                                                                                                                                                     BP;
                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  98US-0079678P
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                                                                                                                                                                                                                                     8 C; 2 G; 0 T;
                                                                                                            1.6%;
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                                                                                                                                                                                                                                                                                                             or integrin subunit beta-3
                                                                            4.
                                                                                                                    Score 15.4;
Pred. No. 1
                                                                                Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Coeshott C,
                                                                                                                                                                                                                                     5 U;
                                                                                                                                                                                                                                         0 Other;
                                                                                                                    6e+03
                                                                                                                                                        DB 1;
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                                                                                                                                                        Length 17;
                                                                                    Indels
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                                                                                    0
                                                                                    Gaps
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AAA25179
ID AAA2
XX
AC AAA2
XX
DT 19-;
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                                                                                                                RESULT 1843
                                                                                                                                                                                                                                                                                                                                      CC cleaving activity, which specifically cleave RNA encoded by an aryl cleave range could by an aryl cleave RNA encoded by an aryl country gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA1675 to AAA17622 represent ribozyme sequences for ARNT, CC corresponding target sequences. AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 to AAA19154 represent ribozyme sequences. CC AAA19155 to AAA20361 and AAA21501 to AAA218385 and AAA19086 CC AAA19223 to AAA20361 and AAA21501 to AAA21955 represent ribozyme sequences. CC cand control of the sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA22475 and AAA23263 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA23476 to AAA23262, AAA23343 to CC CAAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC the invention are used for modulating the synthesis, expression and/or CC stability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related CC mecular degeneration (ARMD), inflammation, and arthritis, as well as CC angiotibroma of tuberous sclerosis, pot-wine stains, Sturge Weber CC syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, CC integrin subunit alpha-6, or integrin subunit beta-3 or integrin subuni
                                                                                                                                                                                                                                                 Query Match
Best Local
                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiotibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                19-JUL-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 1999-591315/50
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                                                 AAA25179;
                                                                               AAA25179
                                                                                                                                                                                                                                                                                               Sequence 17 BP; 5 A; 4 C; 6 G; 0 T; 2 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       24-MAR-1999;
                                                                                                                                                                                               211
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          54; Page 253; 305pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ribozymes for modulating the synthesis, expression and/or stability {\tt mRNA} encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          PA,
                                                                                                                                                                 17
                                                                                                                                                                                                                                l Similarity
16; Conserv
                                                                                                                                                                                     CTGGTCTCGAACTCCCG 227
                                                                                                                                                                                                                                                                                                                             subunit alpha-6, or integrin subunit beta-3
                                                                                 standard;
                                                                                                                                                               CTGGTCTCGAACTCCTG 1
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                                                                                                                                                                                                                                Conservative
                (first entry)
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                                                                                 DNA;
                                                                                                                                                                                                                                               94.18;
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                                                                                 17
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                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                               Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                Mismatches
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                                                                                                                                                                                                                                                                DB 1;
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                                                                                                                                                                                                                                                             Length 17
                                                                                                                                                                                                                                Indels
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Oestrogen receptor hammerhead ribozyme target sequence SEQ ID NO:2051.

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RESULT 1844
AAA25553/c
ID AAA2555
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Best Local :
                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           for other conditions associated with levels of osetrogen receptor.

Because of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, particularly for identification of therapeutic targets, and as research reagents (for RNA, in the same way that restriction endonucleases are used with DNA). The combination of modifications in (A) improves used with DNA) are combination of modifications in (A) improves the resistance to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent oestrogen receptor hammerhead ribozyme sequences, and AAA25992 represent their corresponding target sequences. AAA26107 to AAA26107 to AAA2618 represent their corresponding target sequences. AAA2619 to AAA26271 represent other ribozyme sequences and anactisense oligonucleotides used in the exemplification of the present
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Oestrogen receptor; c-raf; k-ras; bcl-2; ribozyme; cleavage; hammerhead ribozyme; hairpin ribozyme; antisense oligonuclec gene expression modification; cancer; phosphorothioate; endc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention describes nucleic acids (A) that interact stably with a target sequence and contain at least one phosphoro(di)thioate link, having endonuclease activity. (A), and more generally any catalytiquicleic acid (A') that modulates expression of the oestrogen receptor gene, are used to treat cancer (particularly of breast or endometrium), in vivo or by transforming cells ex vivo and implanting treated cells, (a)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 77; Page 71; 148pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New nucleic acids that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2000-013248/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Reynolds M, Zwick M, Matulic-Adamic J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Thompson JD,
Reynolds M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                19-APR-1999; .
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 anticancer; breast cancer; endometrium cancer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Oestrogen receptor hammerhead ribozyme target sequence
                                                       AAA25553;
                                                                                                           AAA25553 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        20-APR-1998;
23-JUN-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            28-OCT-1999.
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19-JUL-2000 (first entry)
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                                                                                                                                                                                                                                                                                      594 ATTTTTATTTTATTTT 610
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                                                                                                                                                                                                                                                                                                                                                   16;
                                                                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                            17
                                                                                                                                                                                                                                             ATTITIGTTTTTATTT 17
                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 2 A; 0 C; 1 G; 14 T; 0 U; 0 Other;
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Zwick M, Jarvis
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98US-00103636.
                                                                                                           DNA; 17
                                                                                                                                                                                                                                                                                                                                                                         1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          interact, and optionally cleave, target sequences,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mcswiggen JA,
ris T, Woolf T,
                                                                                                                                                                                                                                                                                                                                                   0
                                                                                                                                                                                                                                                                                                                                                                                 Pred.
                                                                                                                                                                                                                                                                                                                                                                                                       Score 15.4;
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cancer; phosphorothioate; endonuclease;
                                                                                                                                                                                                                                                                                                                                                        Mismatches
                                                                                                                                                                                                                                                                                                                                                                                 No.
                                                                                                                                                                                                                                                                                                                                                                                 .6e+03;
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Haeberli
                                                                                                                                                                                                                                                                                                                                                                                                       Length
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                                                                                                                                                                                                                                                                                                                                                      Indels
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RESULT 1845
AAA25554/c
ID AAA25554 :
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  Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                          Matches
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Reynolds
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23-JUN-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               sequences, and AAA26107 to AAA26218 represent their corresponding target sequences. AAA26219 to AAA26271 represent other ribozyme sequences and antisense oligonucleotides used in the exemplification of the present
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Oestrogen receptor; hammerhead ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17 BP; 14 A;
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                                                                    Oestrogen receptor
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                                                                                                                                                                                                      standard;
                                                                                                                                                                                                                                                                                                                                                             TTTATTTTATTTTTTTT 445
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Zwick M, Jarvis T, Woolf T,
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98US-00103636
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                                                                    hammerhead ribozyme target sequence
                                                                                                                                                                                                        DNA; 17
c-raf; k-ras; bcl-2; ribozyme; cleavage;
; hairpin ribozyme; antisense oligonucleo
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       antisense oligonucleotide;
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Haeberli
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Cg gene, are used to treat cancer (particularly of breast or endometrium), cc in vivo or by transforming cells ex vivo and implanting treated cells, or CC for other conditions associated with levels of bestrogen receptor. CC Because of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, cc particularly for identification of therapeutic targets, and as research CC reagents (for RNA, in the same way that restriction endomucleases are CC used with DNA). The combination of modifications in (A) improves CC resistance to nucleases, binding affinity and/or activity. AAA23503 to CAAA2474 represent oestrogen receptor hammerhead ribozyme sequences, and CC AAA2474 represent oestrogen receptor hammerhead ribozyme sequences. CC RAA24748 to AAA25992 represent their corresponding target sequences. AAA26219 to AAA26218 represent of the receptor hairpin ribozyme cc sequences. AAA26219 to AAA26271 represent other ribozyme sequences and cantisense oligonucleotides used in the exemplification of the present criventics.
                                                                                                                                                                                                                                                                                                                                     RESULT 1846
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Oestrogen receptor; c-raf; k-ras; bcl-2; ribozyme; cleavage; hammerhead ribozyme; hairpin ribozyme; antisense oligonucleo gene expression modification; cancer; phosphorothioate; endo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New nucleic acids that interact, and optionally cleave, target sequences, used to treat cancer.
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23-JUN-1998;
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                                                                                                                                                                                                                            AAA25180;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 17 BP; 14 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 77; Page 83; 148pp; English.
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                                                                                                                 Oestrogen
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Similarity 94.1%;
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                                                                                                                 receptor hammerhead ribozyme target sequence
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Zwick M, Jarv
                                                                                                                                                                           (first entry)
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98US-00103636
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Jarvis T, Woolf T,
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                                                                                                                                                                                                                                                                                      ВP
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Haeberli P;
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Correlate inhibition of gene expression with alterations in phenotype, carticularly for identification with alterations in phenotype, particularly for identification with alterations in phenotype, carticularly for identification of modifications in (A) improves reagents (for RNA, in the same way that restriction endonucleases are used with DNA). The combination of modifications in (A) improves resistance to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent oestrogen receptor hammerhead ribozyme sequences, and AAA26305 represent their corresponding target sequences.

AAA24748 to AAA263105 represent their corresponding target sequences. AAA2593 to AAA263105 represent their corresponding target sequences. AAA263107 to AAA26211 represent their corresponding target sequences and attisense oligonucleotides used in the exemplification of the present
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Best Local S
Matches 16
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                                                                Ribozyme; erythropoietin; granulocyte colony stimulating factor; interferon alpha; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 77; Page 71; 148pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New nucleic acids that interact, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Thompson JD, Reynolds M,
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23-JUN-1998;
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   WO200061729-A2
                                 Homo sapiens
                                                                                                                 Hammerhead ribozyme substrate #2947.
                                                                                                                                                 16-FEB-2001
                                                                                                                                                                                                                AAF06150 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17
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16; Conserv
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Zwick M, Jarvis T, Woolf T,
                                                                                                                                                (first entry)
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98US-00103636.
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Haeberli P;
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Best Local S
Matches 2
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                                             Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 17 BP; 2 A; 0 C; 1 G; 0 T; 14 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Ribozyme; erythropoietin; granulocyte colony stimulating factor; interferon alpha; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Hammerhead ribozyme substrate #2946.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Claim 42; Page 123; 164pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Homo sapiens.
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                                                                                                                                                           WPI; 2000-647423/62.
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                                                                                                                                                                                                                 Zwick M,
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Pred. No. 1.
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Claim 42; Page 123; 164pp; English

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RESULT 1849
ABT39409/c
ID ABT3940
The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal calignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement confined and of the invention are useful as probes and primers for detecting, cands of the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, colypeptides, vectors containing the nucleic acids, cells containing the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Best Loc
Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             schizophrenia;
human fukutin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 623; 720pp; French.
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Pred. No. 1.6e+03;
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              The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive cc nucleotides from the 17 mer sequence, a sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence that cc Alignment, at least 80 % identity to the 17 mer sequence, a sequence that cc of any of them, or the corresponding RNA. The novel isolated nucleic cc acids of the invention are useful as probes and primers for detecting, cc identifying, quantifying and/or amplifying a nucleic acid, e.g. as one cc component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, colls containing the vector or antibodies directed against the polypeptides are useful for c preparation of pharmaceuticals for prevention and/or treatment of viral cdiseases that are characterised by development of tumours or cell containing the expression of the 17 mer nucleic acids in schizophrenia. Analysis of the expression of the 17 mer nucleic acids in the containing the 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene antisense; sense; tumour; cell degeneration; cancer; Alzheimer's dis schizophrenia; protein chip; gene therapy; tumour suppression;
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human fukutin;
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RESULT 1851
ABT38151
The invention relates to a novel isolated 17 mer nucleic acid sequence, conversions in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement coff any of them, or the corresponding RNA. The novel isolated nucleic cacids of the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, e.g. as one component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, cells containing the nucleic acids, cells containing the corresponding vectors containing the nucleic acids, cells containing the corresponding to the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. Analysis of the expression of the 17 mer nucleic acids in gatient samples is useful for diagnosis and/or prognosis of these containing the useful to penerate antibodies, and both the polypeptide and antibodies are useful as components of protein
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cc given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that CC hybridizes to them under highly stringent conditions, or the complement CC acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, cp polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for diseases that are characterised by development of tumours or cell components. Analysis of the expression of the 17 mer nucleic acids in patient samples is useful for diagnosis and/or prognosis of these chips. The polypeptides can also be used to generate antibodies, and chips. The nucleic acid sequences of the invention can be used in gene therapy. This polynucleotide sequence represents a tumour surcein
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Matches 16
                                                      nucleotides from the 17 mer sequence, a sequence with, after optimal controlled from the 17 mer sequence, a sequence with, after optimal conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic cacids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying and primers for detecting, component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, polypeptides, vectors containing the nucleic acids, cells containing the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral containing that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and components is useful for diagnosis and/or prognosis of these containing the polypeptides are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the inventor management of the polypeptide and antibodies are useful as components of protein containing the inventor management of the containing the containing the polypeptides and antibodies are useful as components of protein containing the inventor management of the containing the component of the containing the containing the containing the conta
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New isolated nucleic acid, useful with tumors and cell degeneration,
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                      related human
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                         invention relates to a novel isolated 17 mer nucleic acid
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                      polynucleotide sequence represents a tumour suppression fukutin oligonucleotide of the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        acid, useful for treating viral diseases associated degeneration, also related polypeptides, antibodies
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ABT38728/c
                                                    Cg given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that CC hybridizes to them under highly stringent conditions, or the complement CC drief of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, CC production of recombinant polypeptides. Any of the nucleic acids, CC production of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and CC gatient samples is useful for diagnosis and/or prognosis of these CC diseases. The polypeptides can also be used to generate antibodies, and oth the polypeptide and antibodies are useful as components of protein chips. The nucleic acid sequences of the invention can be used in gene theraw. This polymelactide sequences of the invention can be used in gene
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                                                                                                                                                                                                                                                                                                                                                                                                       Disclosure; Page 544;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
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human fukutin;
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                                                                                                                                                                                                                                                                                                                                                                     invention relates to a novel isolated 17 mer nucleic acid sequence,
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                                                               The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement CC of any of them, or the corresponding RNA. The novel isolated nucleic CC acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, CC polypeptides, vectors containing the nucleic acids, cells containing the containing the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral CC degeneration, specifically cancer but also Alzheimer's disease and CC diseases that are characterised by development of tunours or cell containing the schizophrenia. Analysis of the expression of the 17 mer nucleic acids in Datient samples is useful for diagnosis and/or prognosis of these CC chips. The nucleic acid sequences of the inventor can be used in gene characterise and antibodies are useful as components of protein the polypeptides and antibodies are useful or can be used in gene characterise of protein can be used to generate antibodies.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cytostatic; virucide; neuroprotective; nootropic; antisense; sense; tumour; cell degeneration; cance
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tumour suppression
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         12-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure; Page 330; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      17-SEP-2001; 2001FR-00011978
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17-SEP-2002; 2002WO-IB004208
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 27-MAR-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        schizophrenia;
human fukutin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABT36908
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABT36908 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (MOLE-) MOLECULAR ENGINES LAB
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 16;
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                                                       This
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AGTGGAGTGGTGATC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                  polynucleotide sequence represents a tum fukutin oligonucleotide of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          protein chip; gene ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   related human fukutin oligo SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 94.1%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             opic; neuroleptic; gene chip;
cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           suppression;
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                                                 tumour suppression
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Best Local Similarity

1.6%; 7 C; 4 G;

Score 15.4; DB 1; Pred. No. 1.6e+03;

Length 17;

Matches

16;

Conservative

0

Mismatches

Indels

٥,

Gaps

0

Query Match Best Local Similarity

1.6%; 7 C;

Score 15.4; DB 1 Pred. No. 1.6e+03

Length 17;

17

B₽;

N Α,

4 G;

4 T;

0 U;

0 Other; DB 1;

Query Match

Sequence

17

₽P;

1 A;

5 T;

0 U;

0 Other;

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RESULT 1856
ABT35856
ID ABT3585
The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive CC nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence that CC hybridizes to them under highly stringent conditions, or the complement CC did any of them, or the corresponding RNA. The novel isolated nucleic CC acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, collypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for CC preparation of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell CC diseases that are characterised by development of tumours or cell CC diseases. The polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of these CC diseases. The polypeptides can also be used to generate antibodies, and CC both the polypeptide and antibodies are useful as components of protein CC thips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips. The polypeptide acid sequences of the invention can be used in gene chips.
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antisense; sense; tumour; cell degeneration;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Tumour suppression related human fukutin oligo SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      12-JUN-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABT35856 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; Page 207; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2003-313353/30.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     17-SEP-2001; 2001FR-00011978
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17-SEP-2002; 2002WO-IB004208
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WO2003025175-A2
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human fukutin; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   antisense; sense; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Telerman A, Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   27-MAR-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        nootropic;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1;
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837

GATCTGCCTGCCTCGGC GATCTGCCTGCCTCGAC 17

853

RESULT 1857

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                                                                                                                                                      The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence with, after optimal cc hybridizes to them under highly stringent conditions, or the complement co f any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, cc polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell diseases that are characterised by development of tumours or cell contains smples is useful for diagnosis and/or prognosis of these containing the polypeptides can also be used to generate antibodies, and contains the polypeptide and antibodies are useful as components of these caid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips.
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                                                                        Query Match
Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Disclosure; Page 578; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          with tumors and cell d
and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   27-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Tumour suppression related human fukutin oligo
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                      492
GATCACAGCTCACTGCA 508
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Amson R,
                                                                                                                               BP; 4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               protein chip; gene therapy; tumour suppression; ds.
                                                                        1.6%;
                                                                                                                               6 C; 4 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ВP
                                                         0
                                                                          Score 15.4; DB 1
Pred. No. 1.6e+03
                                                         Mismatches
                                                                                           15.4;
                                                                                             DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SEQ
                                                                                         Length 17;
                                                          Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          IJ
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                                                          0;
                                                          Gaps
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AGTGCAATGGTGTGATC AGTGCAGTGGTGATC 495

479 17

Query Match Best Local S Matches

Similarity

Conservative

0

17

BP; 5

A; 6 C; 2 G; 4 T; 0 U; 0 Other;

Score 15.4; DB 1; Pred. No. 1.6e+03 Mismatches

Length 17; Indels

0,

Gaps

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ABT40068/c
IID ABT400
XX
AC ABT400
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AC ABT400
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AC ABT400
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Tumour
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HOMO 8
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                                                           The invention relates to a novel isolated 17 mer nucleic acid sequence, completed in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence with, after optimal calignment, at least 80 % identity to the 17 mer sequence that complement at least 80 % identity to the 17 mer sequence that complete sequence of the invention are useful as probes and primers for detecting, cards of the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, component of a gene chip, in vitro as (anti)sense reagents, and for proparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell diseases that are characterised by development of tumours or cell considerated sandysis of the expression of the 17 mer nucleic acids in schizophrenia. Analysis of the expression of the 17 mer nucleic acids in chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene characterised by development of tumours of these chips. The nucleic acid sequences of the invention can be used in gene characterised by development of the sequences of protein chips. The nucleic acid sequences of the invention can be used in gene therapy. This polynucleotide sequence of the invention can be used in gene characterised by development of the sequences of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; geantisense; sense; tumour; cell degeneration; cancer; Alzheimer's schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 700; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
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RESULT 1859
ABT40194/c
ID ABT40194 standard; DNA; 17
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                                                                                                                                                                                                             The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acid sof the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, collared to proper the sequence containing the vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral consistent samples is useful for development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and sehizophrenia. Analysis of the expression of the 17 mer nucleic acids in containing the polypeptides and antibodies are useful as components of protein chips. The nucleic acid sequences of the invention can be used in gene characterised by descent a sequence soft protein contains and protein can be used to generate antibodies.
                                                                                         Query Match
Best Local :
                                                                         Matches
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                                                                                                                                             Sequence 17
                                                                                                                                                                                therapy. This polynucleotide sequence represents a tumour suppression related human fukutin oligonucleotide of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 715; 720pp; French.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          and transfected
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 schizophrenia;
human fukutin;
17
                                                                                           Similarity
                                  AGTGCAGTGGCGCAATC 669
                                                                                                                                               BP; 3 A; 7 C; 4 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                                       Conservative
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                                                                                       94.1%;
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                                                                       0,
                                                                                       Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                       Mismatches
                                                                                                          DB 1;
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                                                                                                      Length 17;
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RESULT 1860

RESULT 1861 ABT40150/c ID ABT4015

ABT40150 standard; DNA; 17

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869 GATTACAGGCGTGAGCC 885

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GATCACAGGCGTGAGCC 17

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ABT35639

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ABT3

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ABT3

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ABT3

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ABT3

XX

Cytc

XXX

XXX

ABT3

XXX

ABT3

ABT3

XXX

Tumc

XXX

ABT3

XXX

ABT3

ABT3

XXX

ABT3

A
                                                                                                                                                                                           The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive CC nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence with, after optimal CC disparent, or them under highly stringent conditions, or the complement CC of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, collypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and cc schizophrenia. Analysis of the expression of the 17 mer nucleic acids in Schizophrenia. Analysis of treatment of viral CC diseases. The polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of these charse. The nucleic acid sequences of the invention can be used in gene charse. This polynucleotide sequence represents a tumour suppression crelated human fukutin oligonucleotide of the invention
Matches
                                Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                  Sequence 17
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16;
                                    Similarity
Conservative
                                                                                                                                         BP; 4 A; 5 C; 6 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
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0;
                                    Score 15.4;
Pred. No. 1.
   Mismatches
                                    .6e+03
                                                                    DB 1;
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cancer; Alzheimer's disease;
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   Indels
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RESULT 1862
ABT35874/c
ID ABT3587
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ΑX
                                                                                                                                                                                                                           Query Match
Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          13-JUN-2003 (first entry)
                                                                                                                                                                                                                                                                                                            Sequence
                                         ABT35874 standard; DNA; 17
  ABT35874;
                                                                                                                                                                                    479
                                                                                                                                               17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                 Similarity
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                                                                                                                                                                                                                                                                                                                17
                                                                                                                                               AGTGCAGTGGCGTGATC 1
                                                                                                                                                                                    AGTGCAGTGGTGATC 495
                                                                                                                                                                                                                                                                                                            BP; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Amson R,
                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                              ₽,
                                                                                                                                                                                                                                               1.6%;
                                                                                                                                                                                                                                                                                                            7 C; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Tuijnder M;
                                         BP
                                                                                                                                                                                                                              0
                                                                                                                                                                                                                                                                                                                G; 3 T; 0 U; 0
                                                                                                                                                                                                                           Score 15.4; DB 1;
Pred. No. 1.6e+03;
0; Mismatches 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    for treating viral diseases, also related polypeptides,
                                                                                                                                                                                                                                                                                                                Other;
                                                                                                                                                                                                                                                                     Length 17;
                                                                                                                                                                                                                                Indels
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                                                                                                                                                                                                                              0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           associated antibodies
                                                                                                                                                                                                                                Gaps
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17

AGTGCAGTAGTGTGATC 1

Matches

479 AGTGCAGTGGTGATC 495

Conservative

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Indels

0

Gaps

0

RXXXE

ABT39264;

12-JUN-2003

(first entry)

ABT39264 RESULT 1863

ABT39264 standard; DNA; 17

ВР

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The invention relates to a novel isolated 17 mer nucleic acid sequence, considering at least 15 consecutive contices from the 17 mer sequence with, after optimal confidered from the 17 mer sequence with, after optimal confidered from the 180% identity to the 17 mer sequence that confidered from the invention are useful as probes and primers for detecting, confidered from the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of recombinant polypeptides. Any of the nucleic acids, colypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for comparation of pharmaceuticals for prevention and/or treatment of viral containing the reparation, specifically cancer but also Alzheimer's disease and schizophrenia. Analysis of the expression of the 17 mer nucleic acids in gatinate that samples is useful for diagnosis and/or prognosis of these containing the polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of protein contains. The nucleic acid sequences of the invention can be used in gene therapy. This polynucleotide sequence for the invention can be used in gene contained the invention can be used in gene contained the invention.
                            Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Tumour suppression related human fukutin oligo SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           antisense; sense; tumour; schizophrenia; protein chi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12-JUN-2003 (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             17-SEP-2001; 2001FR-00011978.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               human fukutin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Cytostatic; virucide; neuroprotective; nootropic;
                                                                                                Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 209; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Telerman A,
Local
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Similarity
                                                                                                ВP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               protein chip; gene therapy; tumour suppression; ds.
                                                                                                    5 A;
1.6%;
                                                                                                    6 C; 2 G; 4 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Tuijnder M;
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Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                        0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      opic; neuroleptic; gene chip;
cancer; Alzheimer's disease;
                                   Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1511.
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Tumour suppression related human fukutin oligo SEQ

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RESULT 1864
ABT40140/c
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                                                                                                                                                                                                                                                                                       Query Match
Best Local S
Matches 16
Tumour suppression related human fukutin oligo SEQ ID No
                                       13-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antiense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                             ABT40140;
                                                                                                                 ABT40140 standard;
                                                                                                                                                                                                                                                                                                                                                                   Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure; Page 606; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17-SEP-2001; 2001FR-00011978
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               17-SEP-2002; 2002WO-IB004208
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2003-313353/30
                                                                                                                                                                                                                                                      837
                                                                                                                                                                                                                                                                                         16;
                                                                                                                                                                                                              _
                                                                                                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                                                                                                  GATCTGCCTGCCTCGGC 853
                                                                                                                                                                                                              GATCTGCCTGCCTCAGC 17
                                                                                                                                                                                                                                                                                                                                                                   BP; 2 A;
                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Amson R,
                                     (first entry)
                                                                                                               DNA; 17
                                                                                                                                                                                                                                                                                                         1.6%;
                                                                                                                                                                                                                                                                                                                                                                   7 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tuijnder
                                                                                                                                                                                                                                                                                       0,
                                                                                                                                                                                                                                                                                       Score 15.4; D
Pred. No. 1.6e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Σ,
                                                                                                                                                                                                                                                                                                           .6e+03;
                                                                                                                                                                                                                                                                                                                           DB 1;
                                                                                                                                                                                                                                                                                                                             Length 17;
                                                                                                                                                                                                                                                                                           Indels
 5777
                                                                                                                                                                                                                                                                                       0,
                                                                                                                                                                                                                                                                                       Gaps
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                                                                                                                                                                                          RESULT 1865
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Cytostatic; immunostimulant; gene therapy; vaccine; human;
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8×3×8×8

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CC given in the specification, a sequence containing at least 15 consecutive conditions, or the complement conditions, or the complement conditions, or the complement conditions, or the complement conditions of the invention are useful as probes and primers for detecting, contentifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of recombinant polypeptides. Any of the nucleic acids, containing the nucleic acids, cells containing the containing the polypeptides are useful for configuration of pharmaceuticals for prevention and/or treatment of viral cliseases that are characterised for prevention and/or treatment of viral cliseases that are characterised but also Alzheimer's disease and configuration, specifically cancer but also Alzheimer's disease and configurations are useful for containing the polypeptides are useful as components of these containing the polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of protein chips. The nucleic acid sequences of the invention can be used in gene therapy. This polypucleotide sequence represents a tumour suppression containing the invention can be used in gene to chips.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 1; Page 709; 720pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   17-SEP-2002; 2002WO-IB004208.
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Human MDZ7
                                                                               20-NOV-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2003-313353/30.
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                                                                                                                                                   ADB04318;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (MOLE-) MOLECULAR ENGINES LAB.
                                                                                                                                                                                                                        ADB04318 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  224 CCCGACCTCAGATGATC 240
                                                                                                                                                                                                                                                                                                                                                                                                                 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
scanning oligonucleotide SEQ ID 5304.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Amson
                                                                        (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.6%;
                                                                                                                                                                                                                           DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      4 C; 7 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 15.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                .6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 17;
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RESULT 1866
ADB04317
ADB04311
AC ADB0431
AC ADB0631
AC 
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               15q26.1. The MD23, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
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New zinc finger-containing proteins and nucleic acids, useful manufacturing a medicament for treating or preventing a disord associated with decreased or increased expression or activity MDZ4, MDZ7 or MDZ12, e.g. cancer.
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proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 5p21.3-22.2, MDZ7 is encoded at chromosome 15p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are useful in Construction with a more accordance and the probes are
                                                        useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 8; SEQ ID NO 5432; 103pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             present invention relates to novel human zinc finger-containing
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Best Matches Query Match Local 777 16; _ Similarity TTTTTAGTAGAGATGGG 793 Conservative 1.6%; 17 0; Pred. No. Score 15.4; Mismatches 1.6e+03; DB 1; Length 17; Indels 0 Gaps

0

Sequence 17 BP; 4 A; 1 C; 6 G; 6 T; 0 U; 0 Other;

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RESULT 1869 ADB04316 ID ADB0431 Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7 chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q EP1281758-A2. Human MDZ7 20-NOV-2003 ADB04316 standard; Homo developmental ADB04316; scanning (first entry) disorder; ss. DNA; oligonucleotide SEQ ID 5302 17 chromosome 16p11.2; chromosome 15q26.1; cancer;

30-JUL-2002; 2002EP-00016874. 05-FEB-2003

02-AUG-2001; 2001US-00922181

(AEOM-) AEOMICA INC

Shannon M, Gu Y, Nguyen Ç

New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ1, MDZ1 or MDZ12, e.g. cancer. or MDZ12, e.g. cancer. MDZ3,

ID NO 5302; 103pp; English.

The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22. MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome The MDZ3, MDZ4, MDZ7, and MDZ12 sequences

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RESULT 1870
ADB04447
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                  The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ4, MDZ7, MDZ12. MDZ31 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12. The probes are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome /4/4/... chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1;
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                                                                                                                                                                                                                                                                                                                                                  New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      developmental disorder; ss.
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ilarity 94.1%;
Conservative
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protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Gu Y,
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Pred. No. 1
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constructing microarrays for measuring

gene

expression. The

Query Match Best Local S Matches 16

Similarity

1.6%;

Score 15.4; D Pred. No. 1.6e 0; Mismatches

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                                                                             The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome fap11.2 and MDZ12 is encoded at chromosome 1sq26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder or in manufacturing a medicament for treating or preventing a disorder or in manufacturing a medicament for treating or preventing a disorder or in MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ7, or MDZ12 genetic locus. The probes are material for management of the probes are manufactured and characterize gross.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invent
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                                                                                                                                                                                                                                                                                                                                                          New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
                                useful in constructing microarrays for measuring gene expression. proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention
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RESULT 1872
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                                                                                                                                                                                                                                                                               proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome fsp11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic
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                                                                                                                                                               useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
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                                                                                                                                  Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Shannon M,
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                                                                  Conservative
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                                                                                                                                  1 C,
                                                                                                                                  5 G; 6 T;
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                                                                0,
                                                                                 Score 15.4; DB 1; Pred. No. 1.6e+03;
                                                                   Mismatches
                                                                                                                                  0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                 zinc finger-containing
                                                                                                 Length 17;
                                                                  Indels
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                                                                <u>.</u>
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RESULT 1873 ABZ60575

Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; antianti-rheumatic; cancer; AIDS; ss.

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ABZ60585
ID ABZ6
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RESULT 1874
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Matches 12
                                                                                                                                                                                                                                                                                                                                                                              acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ5989 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encod. HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
                                                                                                                                                                                                                                                                                                                                      Sequence 17 BP; 4 A; 7 C; 2 G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 58; Page 98; 185pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human K-Ras DNAzyme substrate #687
                                                       Human K-Ras DNAzyme substrate #697.
                                                                                    21-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention relates to a novel short interfering RNA (siRNA) nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABZ60575 standard; RNA; 17 BP
                                                                                                                                              ABZ60585 standard;
                                                                                                                                                                                                                                                                                                                                                                   ribozymes of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                  498 AGCTCACTGCAGCCTTC 514
                                                                                                                                                                                                                                                                                           Similarity
                                                                                                                                                                                                                      AGCUCACUGCAACCUUC 17
                                                                                                                                                                                                                                                                               Conservative
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                                                                                     (first
                                                                                                                                              RNA;
                                                                                    entry)
                                                                                                                                                                                                                                                                                          1.6%;
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                                                                                                                                                                                                                                                                               4.
                                                                                                                                                                                                                                                                                                         Score 15.4;
                                                                                                                                                                                                                                                                                Mismatches
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                                                                                                                                                                                                                                                                                             1.6e+03
                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                                                         Length 17;
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RESULT 1875
ABZ60574
ID ABZ6057
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Matches 12
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovariam, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human ribox mere of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 58; Page 98; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                      Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human K-Ras DNAzyme
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17 BP; 3 A; 3 C; 6 G; 0 T; 5 U; 0 Other;
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   29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
                                                                                       29-MAY-2002; 2002WO-US016840
                                                                                                                                                                                                            WO200297114-A2
                                                                                                                                                                                                                                                                                                                                anti-rheumatic;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                                                                                                                                                                                                                                                                                cancer;
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                                                                                                                                                                                                                                                                                                                                AIDS; ss.
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                    acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequence shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66555 represent substrate/target sequences for the human in the control of the formula of the control of the substrate of the human in the control of the c
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                                                                                                                                                                                                                                           Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 58; Page 98; 185pp;
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                                                                                                                                                                                                                                                                                                                                                                    ribozymes of the invention
                                                         Similarity
                                                                                                                                                                                                                                           BP; 4 A;
Conservative
                                            1.6%;
76.5%;
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ω
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                                                               Score 15.4; DB 1
Pred. No. 1.6e+03
      Mismatches
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            Indels
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N-Ras

, prostate, The sequences 0 - ABZ66524,

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ABZ60568
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                                  29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
                                                                                                              29-MAY-2002; 2002WO-US016840
                                                                                                                                                                                                                                Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                Human K-Ras DNAzyme substrate
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                                                                                                                                                                                            WO200297114-A2
(RIBO-) RIBOZYME PHARM INC
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Novel short interfering RNA and enzymatic nucleic acid useful treating cancer, modulates the expression of a nucleic acid er HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequence

encoding

WPI; 2003-140484/13.

Mcswiggen J;

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RESULT 1877
ABZ60586
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acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate,
                                                                                                                                                                                          Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
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06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
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                                                                                                                       The invention relates to a novel short interfering RNA (siRNA) nucleic
                                                                                                                                                           Claim
                                                                                                                                                                                                                                                                WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                               Mcswiggen J;
                                                                                                                                                                                                                                                                                                                                     (RIBO-) RIBOZYME
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                                                                                                                                                       58; Page 98; 185pp; English.
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                                                                                                                                                                                                                                                                                                                                     PHARM INC
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RESULT 1878
ABZ60606
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                           acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59889 - ABZ6216, ABZ64544 - ABZ65311, ABZ66520 - ABZ6524, ABZ66530 - ABZ6555 represent substrate/target sequences for the human ribozymes of the invention
                                                                                                                                                                                                                                                                       Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences
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06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
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                                                                                                                                                                                                                                            Claim
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Score 15.4; Pred. No. 1.

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Length Indels

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RESULT 1880
ABZ60604
ID ABZ6060
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                                                                                                                                                                                                                                                                                                                    Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
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06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
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                                                                                                                                                      Sequence 17 BP; 4 A;
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                                                                                                                                                                                                                                                                                                                                                                              Mcswiggen J;
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          ABZ60604;
                              ABZ60604 standard;
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                                                                                               TCACCCAGGCTGGAGTG 656
                                                                            of the invention
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RESULT 1881
ABZ60597
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Matches 11
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06-JUN-2001;
10-SEP-2001;
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Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                            ABZ60597 standard; RNA; 17 BP
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                                                                                                Human K-Ras DNAzyme substrate
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RESULT 1882
ABZ61843/C
ID ABZ6184
XX Human H
XX Human;
KW Human;
KW enzymat
KW enzymat
XW enzymat
XW O20025
XY O5-DEC-
YD 05-DEC-
YD 05-DEC-
YX 29-MAY-
PF 29-MAY-
PR 06-JUN-
PR 06-JUN-
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PR 06-JUN-
PR 10-SEP-
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                                                                                                                                                                                                                                                             Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
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06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
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                     (RIBO-) RIBOZYME PHARM INC
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2001US-0296249P.
2001US-0318471P.
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The invention relates to a novel short interfering RNA (siRNA) nucleic

Claim 58; Page 98; 185pp; English

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                                           The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration.
                                                                                                                                                                                                                                                New isolated nucleic acid, useful with tumors and cell degeneration, and transfected cells.
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                                                                                                                                                                                                                    Disclosure;
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13; Conserv
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                                                                                                                                                                                                                                                                     useful for treating viral diseases associated eration, also related polypeptides, antibodies
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Pred. No. 1.6e+03;
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are characterised by specifically cancer !

but also Alzheimer's

disease and schizophrenia

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AXU ADB44008 RESULT 1886

ADB44008;

ADB44008 standard; DNA; 17

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ACC68479
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                                                                                                                        The present invention relates to murine oligonucleotides (ACG82754-ACG68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of gene chip; in vitro as (anti)sense reagents; and (2) for production or recombinant polypeptides. The oligonucleotides are useful for prepara of pharmaceuticals for prevention and/or treatment of viral diseases are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                New isolated nucleic acid, with tumors and cell degene and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              tumour suppression; tumour reversion; apoptosis; virus resistance; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Cytostatic; virucide; neuroprotective; nootropic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Murine oligonucleotide associated with tumour supression,
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                                                                                                   Sequence 17
                                                                                                                                                                                                                                                                        Disclosure; Page 700; 738pp; French
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  schizophrenia; ss.
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                 GATCTGCCTGCCTCGGC 853
 GATCTGCCTGCCTCTGC
                                                                                                    BP; 1 A; 7 C; 4 G; 5 T; 0 U; 0 Other;
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                                                               94.1%;
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Pred. No. 1.6e+03;
                                                                            Score 15.4; DB 1;
                                                                 Pred. No. 1.6e+03;
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                                                   Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          apoptosis; virus resistance;
                                                                             Length 17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         neuroleptic;
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antibodies
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RESULT 1887
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ID ADB4114
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DT 18-DEC-
DT 04-DEC-
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                                                                                                                                                                                                                                                                                                                                                The invention relates to the isolation of 6327 nucleotide sequences, and of fragments of at least 180% identify, after optimal alignment, with the consecutive nucleotides of these nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides. The nucleotides are used as probes or primers for detecting, condensitying, quantifying and/or amplifying nucleic acids, as in vitro conservation or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and colls containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours containing the expression of the nucleotides can be used for diagnosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, contentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                      Query Match
Best Local
                                                                                                                                                                                                                                        Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss;
primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        18-DEC-2003
04-DEC-2003
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04-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                                                       Sequence 17 BP; 4 A; 6 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Telerman A,
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                                                    ADB41143;
                                                                                    ADB41143 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                         expression of the nucleotides
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; Page 538; 771pp; French.
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                                                                                                                                                                                         492 GATCACAGCTCACTGCA 508
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                                                                                                                                                                                                                                       l Similarity
16; Conserv
                                                                                                                                                                      GATCACTGCTCACTGCA 17
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(first en
                                                                                                                                                                                                                                        Conservative
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 (revised)
(first entry)
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                                                                                                                                                                                                                                                        Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                        Mismatches
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                                                                                                                                                                                                                                                                      DB 1;
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CC analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can gotentially useful for treating diseases associated with abnormal constraints.
                                                                                                                                                                                                                                                                                                         Query Match
Best Local (
                                                                                                                                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 primer; probe; tumour suppression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    cytostatic;
              Tumour suppression/reversion
                                               18-DEC-2003
04-DEC-2003
                                                                                                                                                                                                                                                                                                                                                           Sequence 17 BP; 5 A; 6 C; 2 G; 4 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tumour suppression/reversion associated nucleotide
                                                                                                                                   ADB43650 standard;
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                                                                                                                                                                                                                                                                                         16;
                                                                                                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                                                                                                                                         Conservative
                                              (revised)
(first entry)
                                                                                                                                    DNA;
                                                                                                                                                                                                                                                                                                       1.6%; Score 15.4;
94.1%; Pred. No. 1.
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               associated nucleotide #3973.
                                                                                                                                                                                                                                                                                                           1.6e+03
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                                                                                                                                                                                                                                                                                                                           Length 17;
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RESULT 1889
ADB44570
                                                                                                                                                                                                                                                                                                                                                                                                                                          the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, cidentifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as cells containing the vectors), the encoded polypeptides and antibodies (also vectors containing them and colls containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

CC or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

CC and/or prognosis of these diseases. The nucleotides and polypeptides can sense used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         useful e.g.
polypeptide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       diagnosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             New nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2003-441574/41.
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                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 17 BP; 1 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The invention relates to the isolation of 6327 nucleotide sequences
            primer; probe; tu
virus resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                                   expression of the nucleotides.
                                               cytostatic;
                                                                           Tumour suppression/reversion associated nucleotide #4893.
                                                                                                              18-DEC-2003
                                                                                                                                                                               ADB44570
                                                                                                                                                                                                                                                                                                 837
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                                                                                                                                                                                                                                                                                                                                                   Similarity
                                                                                                                                                                               standard;
                                                                                                                                                                                                                                                                                                 GATCTGCCTGCCTCGGC 853
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           acid encoding human prostate membrane-specific ant for treatment of tumors and viral infection, also and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Page 496;
            antiviral; neuroprotective; nootropic; neuroleptic; ss; be; tumour suppression; tumour reversion; apoptosis; tance; transgenic animals; Alzheimer's disease; schizoph
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Amson R,
                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                              (first entry)
                                                                                                                                                                             DNA;
                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                    6 C; 5
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                                                                                                                                                                                                                                                                  17
                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                    G; 5 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                   Score 15.4;
Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                     0 Other;
                                                                                                                                                                                                                                                                                                                                                                      DB 1;
                                                                                                                                                                                                                                                                                                                                                                 Length 17;
                                                                                                                                                                                                                                                                                                                                    Indels
                 schizophrenia;
                                                                                                                                                                                                                                                                                                                                    0;
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                                                                                                                                                                                                                                                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                         Query Match
                                   Homo sapiens
                                                                                cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizoph
                                                                                                                                                 Tumour suppression/reversion associated nucleotide #5201
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밁 δ

WO2003040369-A2

18-DEC-2003 ADB44878;

(first entry)

schizophrenia;

ADB44878 standard; DNA; 17

ВP

492 GATCACAGCTCACTGCA 508

Similarity

1.6%; 94.1%;

Score 15.4; DB 1; Pred. No. 1.6e+03; 0; Mismatches 1;

Length 17; Indels

0;

Gaps

0

Conservative

ш

17

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suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia). Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New nucleic acid encoding huseful e.g. for treatment opolypeptide and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         nucleotides. The nucleotides are used as probes or primers for deidentifying, quantifying and/or amplifying nucleic acids, as in sense and antisense sequences, of nucleotides involved in tumour
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-441574/41
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Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure; Page 604; 771pp; French.
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    BP; 5 A;
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    5 C; 3 G; 4 T; 0 U;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             human prostate membrane-specific antigen, of tumors and viral infection, also related
            0 Other
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RESULT 1891
ADB44306
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and colls containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Best
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Query Match
                                                                                                                                          cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizoph
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       potentially useful for treating expression of the nucleotides
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2003-441574/41.
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17-SEP-2002; 2002WO-IB004219.
                              15-MAY-2003
                                                            WO2003040369-A2
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                                                                                                                                                                                                                                                                                                            ADB44306 standard; DNA; 17
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                                                                                                                                                                                                                                                                                                                                                                                                                          837
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                                                                                                                                                                                                                                                                                                                                                                                                                                                       l Similarity
16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Φ
                                                                                                                                                                                                            suppression/reversion
                                                                                                                                                                                                                                                                                                                                                                                                                          GATCTGCCTGCCTCGGC 853
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   acid encoding for treatment
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       BP; 1 A; 7 C; 4 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Page 640; 771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
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                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        94.1%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                human prostate membrane-specific antigen, of tumors and viral infection, also related
                                                                                                                                                                                                                                                                                                                                                                                            17
                                                                                                                                                                                                                                                                                                                                                                                                                                                        0
                                                                                                                                                                                                              associated nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 15.4; DB 1; Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Indels
                                                                                                                                                                                                            #4629
                                                                                                                                            schizophrenia;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    detecting,
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gaps
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The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides. For the complement, or corresponding RNA, of the nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleot acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies
                                           cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          useful e.g. for treatment o polypeptide and antibodies.
Sequence 17 BP; 1 A; 6 C; 5 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; Page 573; 771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2003-441574/41.
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Query Match Matches 16; Conservative Local Similarity 837 GATCTGCCTGCCTCGGC 853 1.6%; 17 0. Score 15.4; Pred. No. 1 Mismatches 1.6e+03 DB 1; Length 17 Indels 0 Gaps 0

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RESULT 1892
AD844574/c
ID AD84457
XX AD84457
XX AD84457
XX Tumour
XX Cytosts
KW primer;
KW virus i
KW virus i
KW virus o
S Homo sa
XX Homo sa
XX I H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer; probe; tumour suppression; tumour reversion; apoptosis
virus resistance; transgenic animals; Alzheimer's disease; schi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          #4897
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        schizophrenia;
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17-SEP-2001; 2001FR-00011981

(MOLE-) MOLECULAR ENGINES LAB

17-SEP-2002; 2002WO-IB004219

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             RESULT 1893
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   conclectides. The nucleotides are used as probles or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Also vectors containing them and colls containing the vectors), the encoded polypeptides and antibodies of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the
                                                                                                                                                                                                                                                                                            cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                tragments
                                                                                                                                                                                                                                            Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                   Tumour suppression/reversion associated nucleotide #4841.
                                                                                                                                                                                                                                                                                                                                                                                                                                            ADB44518;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ADB44518 standard; DNA;
   WPI; 2003-441574/41.
                                  Telerman A,
                                                                                                                                      17-SEP-2002; 2002WO-IB004219.
                                                                                                                                                                       15-MAY-2003
                                                                                                                                                                                                          WO2003040369-A2
                                                                                                      17-SEP-2001; 2001FR-00011981
                                                                     (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 224 CCCGACCTCAGATGATC 240
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1 Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    larity 94.1%;
Conservative
                                  Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
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                                  Tuijnder M;
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                 Alzheimer's disease; schizophrenia;
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lso related
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New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
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cc nucleotides. The nucleotides are used as probes or primers for detecting, clientifying, quantifying and/or amplifying nucleic acids, as in vitro cc sense and antisense sequences, of nucleotides involved in tumour cc suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment cc or cell degeneration (e.g. Alzheimer's disease or schizophrenia). Cc Analysis of the expression of the nucleotides can be used for diagnosis can be used to screen for their specific interactive molecules, contentially useful for treating diseases associated with abnormal corporations of the milloriace sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides. expression of the nucleotides. with the

Sequence 17 BP; 5 A; 8 C; 1 G; 3 T; 0 U; 0 Other

Matches Query Match Best Local 479 AGTGCAGTGGTGATC 495 16; Similarity Conservative 94.1%; <u>,</u> Score 15.4; DB 1; Pred. No. 1.6e+03; Mismatches DB 1; Length 17; Indels <u>.</u> Gaps 0

밁 δ 17 AGTGGAGTGGTGATC 1

29-JAN-2004 ADE14015; ADE14015 standard; DNA; 17 (first entry) ВP

Optineurin promoter motif, repeat element or regulatory region #124.

glaucoma related SNP; Human; optineurin; ds; ophthalmological; single nucleotide polymorphism; glaucoma; progressive rogressive ocular hypertensive dis disorder; motif; repeat element;

Homo sapiens

US2003190617-A1

09-OCT-2003

06-MAR-2002; 2002US-00091281.

06-MAR-2002; 2002US-00091281.

(SIEE/) (RAYM/) (MORI/) SI E. RAYMOND V. MORISSETTE J.

Raymond V, Morissette Ç 2 M

2003-864168/80

New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CC least 20 but not more than 1500 consecutive nucleotides of the optineurin CC promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of CC detecting a single nucleotide polymorphism (SNP) in the optineurin cC promoter, a host cell comprising the promoter operably linked to a CC heterologous sequence, diagnosing or prognosing glaucoma in a sample cobtained from a cell or bodily fluid (comprising detecting a polymorphism CC in a promoter region of the optineurin gene, associated with a glaucoma CC phenotype), detecting a SNP sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation in a sample containing DNA, determining the presence or increased CC disorder resulting in loss of visual field in a patient (or the severity cor progression of glaucoma or to a progressive ocular hypertensive CC amplification reaction primers that direct amplification of a selected containing the variation within the optineurin containing the variation within the optineurin containing the variation within the optineurin containing containing the variation within the optineurin containing containing a sample containing human genomic DNA, providing a nucleic acid capable of detecting a soptineurin promoter, and containing containing the variation within the optineur, and containing containing the variation within the optineur, and containing containing containing the variation as used to diagnose and containing containing the variation as used to diagnose and containing containing promoter motif, repeat element or pursual providers. The containing containi
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 17 BP; 4 A; 1 C; 2 G; 10 T; 0 U; 0 Other;
                    WPI; 2003-864168/80
                                                              Raymond V, Morissette J,
                                                                                                          (SIEE/) SI E.
(RAYM/) RAYMOND V.
(MORI/) MORISSETTE
                                                                                                                                                                                                06-MAR-2002; 2002US-00091281
                                                                                                                                                                                                                                         06-MAR-2002; 2002US-00091281
                                                                                                                                                                                                                                                                                                                                   US2003190617-A1
                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; optineurin; ds; ophthalmological; single nucleotide polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Optineurin promoter motif, repeat element or regulatory region #128
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                                                                                                                                                                                                                                                                                                                                                                                                                       glaucoma; progressive ocular hypertensive coma related disorder; motif; repeat elemen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      589 GGCTAATTTTTATTTT 605
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16; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  regulatory region.
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94.1%;
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Pred. No. 1.6e+03
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Sequence 17

BP; 11

A; 2 C; 0

G; 4 T; 0 U; 0 Other;

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CC heterologous sequence, diagnosing or prognosing glaucoma in a sample contained from a cell or bodily fluid (comprising detecting a polymorphism CC in a promoter region of the optineurin gene, associated with a glaucoma cphenotype), detecting a SNP sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation CC in a sample containing DNA, determining the presence or increased CC susceptibility to glaucoma or to a progressive ocular hypertensive CC disorder resulting in loss of visual field in a patient (or the severity CC or progression of glaucoma in a patient, comprising providing CC amplification reaction primers that direct amplification of a selected CC nucleic acid region containing the variation within the optineurin CC promoter and amplifying the DNA) and detecting a polymorphism (comprising CC obtaining a sample containing human genomic DNA, providing a nucleic acid CC detecting the polymorphism). The invention is used to diagnose and CC detecting the polymorphism). The invention is used to diagnose and CC present sequence is an optineurin promoter motif, repeat element or CC putative regulatory region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      promoter appearing as ADE13890. Also included are the optineurin promot operably linked to a heterologous nucleic acid, a nucleic acid capable detecting a single nucleotide polymorphism (SNP) in the optineurin promoter, a host cell comprising the promoter operably linked to a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention least 20 but 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     20 but not
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     relates to an isolated nucleic acid (N1) comprising not more than 1500 consecutive nucleotides of the opt
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1500 consecutive nucleotides of the optineurin 3890. Also included are the optineurin promoter ologous nucleic acid, a nucleic acid capable of
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RESULT 1896
ADE43565/c
ID ADE4356
XX
ADE4356
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ADE4356
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ADE4356
AD 밁 S Query Match
Best Local Similarity
Matches 16; Conserv 25-OCT-2001; 2001US-0339525P.
08-NOV-2001; 2001US-0336929P.
08-NOV-2001; 2001US-0338010P.
09-NOV-2001; 2001US-0338363P.
04-DEC-2001; 2001US-0337052P.
28-MAR-2002; 2002US-0368919P. Neurodegenerative disease; uPA; SNCG; IDE; KNSL1; LIPA; TNFRSP6; Alzheimer's disease; neuroprotective; nootropic; gene therapy; Chromosome 10; PCR; primer; ss. Human IDE sequencing primer, SEQ ID 170. 03-JUL-2003 WO2003054143-A2 Homo sapiens 29-JAN-2004 ADE43565; ADE43565 standard; 25-OCT-2002; 2002WO-US034679 (NEUR-) NEUROGENETICS INC 770 17 TTTTATATTTTAGTAG TTTTGTATTTTTAGTAG Conservative (first DNA; entry) 1.6%; 17 786 \vdash ₽P 0; Score 15.4; Pred. No. 1. Mismatches .6e+03 DB 1; Length 17; Indels <u>.</u> Gaps

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  PRINCE PR
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ADI50915/c
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The present invention relates to a method (M1) for determining a predisposition for or the occurrence of neurodegenerative disease in a subject. The method comprises detecting in a target nucleic acid obtained from the subject the presence or absence of an allelic variant of one or more polymorphic regions of one or more genes selected from uPA (Urokinase plasminogen activator), SNCG (gamma-synuclein), IDE (insulindegrading enzyme), KNSL1 (Kinesin-like protein 1), LIPA (19sosomal acid lypase), and TNFRSF6 (Tumour Necrosis Factor Receptor-SF6), where the presence of at least one of the allelic variant of one or more polymorphic regions is indicative of a predisposition for or the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Determining a predisposition for or the occurrence of neurodegenerative disease, e.g. Alzheimer's disease by detecting in a target nucleic acid the presence or absence of an allelic variant of one or more polymorphic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           occurrence of neurodegenerative disease. The genes are all located on chromosome 10. M1 is useful for determining a predisposition for or the occurrence of, and for treating neurodegenerative disease, particularly Alzheimer's disease. The present sequence is a PCR primer, which was used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human tumour suppression/reversion-related DNA sequence
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New isolated nucleic acid, useful for treating viral diseases associated
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   tumour suppression; tumour reversion; apoptosis; virus resistance;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
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                                                                                                                                                                     (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      the method of the invention.
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                                                       2003-313354/30.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               BP; 3 A; 8 C; 3
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Sampson AJ,
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Pred. No. 1
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Blacker I
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.6e+03;
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This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the

New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.

associated antibodies

Disclosure;

SEQ ID NO 3226; 30pp; French

WPI;

2003-313354/30

Telerman

P

Amson

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Tuijnder

(MOLE-)

MOLECULAR ENGINES LAB

27-MAR-2003

WO2003025177-A2 Homo sapiens

Alzheimer's disease; schizophrenia; ds; human

17-SEP-2002; 2002WO-IB004523.

17-SEP-2001;

2001FR-00011980.

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RESULT 1898
ADI50723/c
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Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention. Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO at fip. wipo.int/pub/publishedpct_sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Disclosure; SEQ ID NO 3418;
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                                                                                                                                                                                                                                                                                                                                                                 tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroprotective; nootropic; neuroleptic; proprimer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADI50723 standard; DNA; 17
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              This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that
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                                                                development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, aquantifying and/or amplifying nucleic acid, for example as one component of a gene chip, i vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of vital diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention. Note: The sequence data for this patent did not form part of the printe specification, but was obtained in electronic format directly from WIPC appears to the component of the printe specification, but was obtained in electronic format directly from WIPC appears to the component of the printe specification, but was obtained in electronic format directly from WIPC appears to the component of the printe specification, but was obtained in electronic format directly from WIPC appears to the component of the printe specification, but was obtained in electronic format directly from WIPC appears to the component of the printe specification and the component of the printer specification and the co
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and/or resistance to viruses.
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                                                                                                                                                                                                                                   Sequence
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Pred. No. 1.6e+03;
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ACC51497/c
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ss; tumour suppressor; antitumour; cytostatic; tumour suppression; tumour regression; apoptosis; virus resistance; diagnosis; cellular degeneration.
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94.1%;
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                        disease,
                                                 New nucleic acid sequences associated with tumor suppression,
                                                                                                       Tuijnder M,
                                                                                                                                                         20-JUN-2001; 2001FR-00008139
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                                                                                                                                                                                                                                                                                                                      ss; tumour suppressor; antitumour; cytostatic; tumour suppression;
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                                      or virus
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                       resistance are useful to diagnose and t
nt of tumor cells and cell degeneration.
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Best Local (
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                                                                                                                                        This sequence represents an isolated nucleic acid sequence associated with tumour suppression or regression, apoptosis or virus resistance. invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
                                                                                                                                                                                                                                                                                     New nucleic acid sequences associated with tumor suppression, rapoptosis or virus resistance are useful to diagnose and treat disease, development of tumor cells and cell degeneration.
                                                                                                                Sequence 17 BP; 4 A; 7 C; 3 G;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             tumour regression; apoptosis; virus cellular degeneration.
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                                        ss; tumour suppressor; antitumour; cytostatic; tumour suppression; tumour regression; apoptosis; virus resistance; diagnosis; cellular degeneration.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Claim 1; Page 683; 798pp; French.
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New nucleic acid sequences associated with tumor suppression, regression, apoptosis or virus resistance are useful to diagnose and treat viral disease, development of tumor cells and cell degeneration.

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                                                                                                                         with tumour suppression or regression, apoptosis or virus resistance. invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
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tumour regression; apoptosis; virus resistance; diagnosis;
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central necrous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                                 Human
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   arthritis;
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Best Local :
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29-MAY-2001;
28-AUG-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), inhappab kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: certaing cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase opprotein kinase PKR genes, for treating cancer and inflammatory disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Blatt L,
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence
                                                                                                                        Human PKR
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                                                                                                                        substrate
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; 2001US-0294412P.
; 2001US-0315315P.
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RESULT 1913

ADL49966 standard; RNA; 17

ВP

prostaglandin D2 receptor; PTGDR; IkappaB kinase; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease;

Human PKR

substrate sequence #1080

20-MAY-2004 ADL49966;

(first

entry)

antisense oligonucleotide;

neurite

growth

inhibitor; NOGO;

IKK;

cord injury;
rheumatoid a

arthritis;

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CC The invention comprises nucleic acids (e.g. antisense oligonucleotides)
CC that down regulate the expression or inhibit the function of a receptor
CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
CC IRappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
CC invention are useful for treating: cerebrovascular accident, central
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC greatenosis or asthma), inflammatory disease (e.g. rheumatoid arthritis,
CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
CC disease, lupus, multiple sclerosis, transplant/graft rejection,
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC currension of a target gene and as a diagnostic tool to examine genetic
CC drifts and mutations within diseased cells or to detect the presence of a
CC current or compression of a cell. The present RNA sequence represents a human PKR
CC substrate ceromore.
                                                      Matches
                                                                                                             Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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671 TGGCTCACTGCAACCTC 687
                                                      l Similarity
12; Conser
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                                                                                Score 15.4; DB 1;
Pred. No. 1.6e+03;
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RESULT 1914
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Human F
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal cord inj
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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                                                                                                                                                                                                                               RNA; 17
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Pred. No. 1.6e+03;
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   cord injury; cancer;
rheumatoid arthritis;
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is; sepsis;
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Matches 12
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              antisense oligonucleotide; neurite growth inhibitor; Nt
prostaglandin Dz receptor; PTGDR; IkappaB kinase; IKK;
protein kinase PKR; cerebrovascular accident;
central nervous system injury; CNS injury; spinal cord
                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17 BP; 2 A; 4 C; 7
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       05-APR-2001; 2001US-00827395.
29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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                                                                                                  Human
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                                                                                                                                                                                                     ADL50202 standard;
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                                                                                                                                                                                                                                                                                                                        940 TTACCCAGGCTGGAGTG 956
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CNS injury; spinal cord injury; flammatory disease; rheumatoid as
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                                                                                                                                                                                                                                                                                                                                Query Match
Best Local :
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29-MAY-2001;
28-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                     Human PKR
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2001US-0294412P.
2001US-0315315P.
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Pred. No. 1.
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Human PKR 20-MAY-2004

substrate sequence

#1065

(first

entry)

antisense oligonucleotide;

neurite growth PTGDR; IkappaB

inhibitor; N kinase; IKK;

NOGO

cord injury; cancer;
rheumatoid arthritis;

prostaglandin D2 receptor; rigur, anger prostaglandin D2 receptoryascular accident; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal central nervous aystem injury; spinal nervou

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RESULT 1917
ADL49951
ID ADL4995
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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  ADL49951 standard; RNA; 17
                                                                                                                                                                                                                                                             Local
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10; Conserv
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restenosis or asthma), Crohn's disease, diabetes, obesity, autoimune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of carget RNA in a cell. The present RNA sequence represents a human PKR minister.
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
                                                                                                     antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
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Pred. No. 1.
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DT 20-MAY-
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W antisen
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Matches 12
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury melanoma; lymphoma; glioma; inflammatory disease; rheumatoid
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                                                                                                                    ADL49931 standard;
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                                                                                                                                                                                                                   RNA;
                                                                                                           sequence #1045.
                                                                                                                                              entry)
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                    spinal cord injury; cancer;
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Matches 13
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IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenceis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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     antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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           arthritis;
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28-AUG-2001; 2001US-0315315P.
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antisense oligonucleotide; neurite growth inhibitor; No prostaglandin D2 receptor; PTGDR; IKappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord melanoma; lymphoma; glioma; inflammatory disease; rheu
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                                                                                                                                          substrate
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length 17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Indels
                                                                                                NOGO;
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cord injury; cancer;
rheumatoid arthritis;

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RESULT 1922
ADL49930
ID ADL4993
XX
AC ADL4993
XC ADL4993
XX
DT 20-MAY-
XX
DT 20-MAY-
XX
DT 20-MAY-
XX
CONTROL
XW ANTISEN
KW PYOSEAS
KW PYOSEAS
KW PYOSEAS
KW CENTROL
KW CENTROL
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                                                                                                                                                                                                                                                                                                                      밁
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The invention comprises nucleic acids (e.g. antisense oligonucleotides)
that down regulate the expression or inhibit the function of a receptor
for a neurite growth inhibitor, NCGO, prostaglandin D2 receptor (PTGR),
C IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
invention are useful for treating: cerebrovascullar accident, central
reryous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
c lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,
c restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
disease, lupus, multiple sclerosis, transplant/graft rejection,
c cichaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic
c conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
nucleic acids of the invention are also useful for down-regulating the
c expression of a target gene and as a diagnostic tool to examine genetic
drifts and mutations within diseased cells or to detect the presence of a
target RNA in a cell. The present RNA sequence represents a human PKR
                                                                                                                                                                                                                                                                                                                                                                                         Query Match
Best Local S
Matches 9
antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            05-APR-2001; 2001US-00827395
29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     substrate; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    autoimmune disease; lupus; multiple sclerosis; transplant rejecti graft rejection; ischaemia; reperfusion; glomerulonephritis; seps allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         restenosis; asthma; Crohn's disease; diabetes; autoimmune disease; lupus; multiple sclerosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 59;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-058513/05.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Blatt L,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 17
                                                                                                                                                   20-MAY-2004
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                                                                                                                                                                                                                            ADL49930 standard;
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9; Conser
                                                                                                                                                                                                                                                                                                                      UUCAAGUGAUUCUCCUG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      sequence.
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                                                                                                               substrate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 3 A; 4 C; 3 G; 0 T; 7 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                             Conservative
                                                                                                                                                   (first
                                                                                                                                                                                                                            RNA;
                                                                                                             sequence #1044.
                                                                                                                                                   entry)
                                                                                                                                                                                                                                                                                                                                                                                                          1.6%;
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                                                                                                                                                                                                                                                                                                                                                                                           7;
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                            6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                            Length 17;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            rejection;
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RESULT 1923
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Best Local S
Matches 13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (or a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), intervous growth inhibitor, or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central necrowas growth of the protein provided in provided in the protein protein protein protein provided in the protein p
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29-MAY-2001;
28-AUG-2001;
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury melanoma; lymphoma; glioma; inflammatory disease; rheumatoid
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                                                                                                                                                                                                                                                                                                      ADL50731
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17 BP; 2 A; 7 C; 4 G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             substrate sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 59; SEQ ID NO 3463; 317pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            protein kinase PKR genes,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2003-058513/05
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                                                                                                                                                Human PKR
                                                                                                                                                                                                                                                     ADL50731;
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                                                                                                                                                                                                    20-MAY-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              715
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or
in kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ŗ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Similarity
                                                                                                                                                                                                                                                                                                      standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GCCCCAGCCTCCTGAGT 731
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                                                                                                                                                   substrate sequence
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2001US-0294412P.
2001US-0315315P.
                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                      RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      76.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                  17
                                                                                                                                                     #1845
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 15.4;
Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1; Length 17;
                         spinal cord injury; cancer;
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arthritis

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ADI49907
ID ADI4
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KW ant
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                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                for a neurite growth inhibitor, NOGO, prostaglanddin DZ receptor (PTGDR). IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR and accounts.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           05-APR-2001; 2001US-00827395.
29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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   antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerbrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                          Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          restenosis;
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                                                                                                                                                                                             ADL49907 standard; RNA; 17
                                                                                                 Human PKR substrate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    invention
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12; Conserv
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                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    comprises nucleic acids (e.g. antisense oligonulate the expression or inhibit the function of
                                                                                                                                 (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ID NO 4264; 317pp; English.
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                                                                                                 sequence #1021.
                                                                                                                               entry)
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                                                                                                                                                                                                                                                                                                                                                           Score 15.4;
Pred. No. 1
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tor (PTGDR),
                                                                                                                                                                                                                                                                                                                                            Gaps
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Human PKR

substrate

ведиепсе entry)

#1317.

(first

antisense oligonucleotide; neurite growth inhibitor; N prostaglandin D2 receptor; PTGDR; KappaB kinase; KK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord melanoma; lymphoma; glioma; inflammatory disease; rheu

cord injury; cancer;
rheumatoid arthritis;

NOGO;

밁 S

ADL50203

standard;

RNA; 17

ADL50203

Matches Query Match Best Local

1 Similarity
12; Conserv

Conservative

4;

Mismatches

70.6%;

Score 15.4; Pred. No. 1

.6e+03

Length 17;

Indels

0

Gaps

0

937

CTGTTACCCAGGCTGGA CUGUUGCCCAGGCUGGA

17 953 Sequence 17

BP; 2 A;

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c; 6

G; 0

T; 4 U;

0 Other; DB 1;

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The invention comprises nucleic acids (e.g. antisense oligonucleotides)
CC that down regulate the expression or inhibit the function of a receptor
CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
CC forpas kinase (IKK), or protein kinase PKR. The nucleic acids of the
CC invention are useful for treating: cerebrovascular accident, central
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC restenosis or asthma), inflammatory disease (e.g. rheumatoid arthritis,
CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
CC disease, lupus, multiple sclerosis, transplant/graft rejection,
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC current season of a target gene and as a diagnostic tool to examine genetic
CC drifts and mutations within diseased cells or to detect the presence of a
CC current season.
                                                                                                                                                                                                                                                                                                                                                                                   Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase oprotein kinase PKR genes, for treating cancer and inflammatory disease
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Blatt
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                                                                                                                                                                                                                                                                                                                                                  SEQ ID NO 3440; 317pp; English.
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RESULT 1926
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XC ADL5074
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DT 20-MAY-
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CM ANTISER
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Matches 13
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graft rejection; ischaemia; reperfusion; glomerulonephritis;
allergy; asthma; allergic rhinitis; atopic dermatitis; human
protein kinase PKR; cerebrovascular accident;
central nervous system injury; CNS injury; spinal
melanoma; lymphoma; glioma; inflammatory disease;
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                 antisense oligonucleotide; neurite growth inhibitor; NOGO;
prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2003-058513/05.
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                                                                                                                                   20-MAY-2004
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                                                                                                                                                                                                   ADL50749 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                    sequence.
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                                                                                                 substrate sequence #1863
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2001US-0315315P
                                                                                                                                  (first
                                                                                                                                                                                                   RNA;
                                                                                                                                   entry)
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C;
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                                                                                                                                                                                                                                                                                                                                                                                                                  0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                 Length 17;
 cord injury; cancer;
rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 inflammatory disease.
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is; sepsis;
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RESULT 1927
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local S
Matches 13
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase opposed kinase PKR genes, for treating cancer and inflammatory disease
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                                                   protein kinase PKR; cerebrovaso central nervous system injury;
                                                                                                             antisense oligonucleotide; neurite growth inhibitor; N
prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 6 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention comprises nucleic acids (e.g. antisense oligonucleocides) that down regulate the expression or inhibit the function of a receptor for a neurite growth inhibitor, NCGO, prostaglandin D2 receptor (PPGDR),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim
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2001US-0294412P.
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sequence
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76.5%;
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Pred. No. 1.
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29-MAY-2001;
28-AUG-2001;
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               invention comprises nucleic acids (e.g. antisense oligonucleotides) town regulate the expression or inhibit the function of a receptor a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    938
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12; Conser
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                                                                                                                                                                                                                                                                                                                                                          standard; RNA; 17
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; 2001US-0294412P.
; 2001US-0315315P.
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                                                                                                                                                                                    sequence #1327.
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Pred. No. 1.6e
4; Mismatches
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               arthritis;
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The invention comprises nucleic acids (e.g. antisense oligonucleotides)
CC that down regulate the expression or inhibit the function of a receptor (CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC (RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC (1ymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lupus, multiple sclerosis, transplant/graft rejection, CC ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC cuncleic acids of the invention are also useful for down-regulating the CC drifts and mutations within diseased cells or to detect the presence of a CC curverus screence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               'restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rej graft rejection; ischaemia; reperfusion; glomerulonephritis; allergy; asthma; allergic rhinitis; atopic dermatitis; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              SEQ ID
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Sequence 17 BP; 2 P 5 C; 6 G; 0 T; 4 U; 0 Other;

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Query Match Best Local Matches Local 12; Similarity Conservative 70.6%; 1.6%; 4. Score 15.4; Pred. No. 1 Mismatches 1.6e+03; DB 1; Length 17; Indels 0 Gaps 0

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           197
Н
     CCATGTTGGTCAGGCTG
CCAUGUUGGCCAGGCUG
          213
17
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ADL50738
prostaglandin D2 receptor; PTGDR; IkappaB kinase; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease;
                                                                Human PKR
                                            antisense oligonucleotide;
                                                                                                                                 ADL50738
                                                                                                                                 standard; RNA; 17
                                                                  substrate
                                                                 sequence
                                                                                      entry)
                                            neurite
                                                                  #1852
                                           growth
                                 inhibitor;
kinase; IK
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cord injury;
rheumatoid ar

IKK;

NOGO

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RESULT 1930
ADL50212
ID ADL5021
XX
AC ADL5021
XX
DT 20-MAY-
DX 20-MAY-
DX Human F
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EM Prostag
KW prostag
KW prostag
KW protein
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Best Local S
Matches
antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injunction melanoma; lymphoma; glioma; inflammatory disease; rheumato
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejecti graft rejection; ischaemia; reperfusion; glomerulonephritis; seps allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 17
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                                                                                                                    ADL50212 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        substrate sequence.
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                                                                                                                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                             (first
                                                                                                                                                                                                                    RNA; 17
                                                                                                          sequence
                                                                                                                                             entry)
                                                                                                                                                                                                                                                                                                                                                                                                1.6%;
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                                                                                                            #1326.
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Pred. No. 1.6e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                 Length 17;
 cord injury; cancer;
rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            רסו, ואמppaB kinase or
inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Fosnaugh
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RESULT 1931
ADL49917
ID ADL4991
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AC ADL4991
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DT 20-MAY-
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DT 20-MAY-
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DT 20-MAY-
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W antiser
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Ct that down regulate the expression or inhibit the function of a receptor (for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lugus, multiple sclerosis, transplant/graft rejection, CC ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC ucleic acids of the invention are also useful for down-regulating the CC nucleic acids of the invention are also useful for down-regulating the CC ucleic acids of the invention are also useful for down-regulating the CC target RNA in a cell. The present RNA sequence represents a human PKR
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Best Local S
Matches 11
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29-MAY-2001;
28-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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                  antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal cord injury; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17 BP; 3 A;
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                                                                                                             Human PKR
                                                                                                                                                 20-MAY-2004
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2001US-0294412P.
2001US-0315315P.
                                                                                                                                                 (first entry)
                                                                                                                                                                                                                         RNA; 17
                                                                                                             sequence
                                                                                                                                                                                                                                                                                                                                                                                                       1.6%;
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5; Mismatches
                                                                                                               #1031.
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Pred. No. 1.
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1;
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lymphoma; glioma;

inflammatory

disease;

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RESULT 1932
ADL49926
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                                                                                                                                                                                                                                                                                                                                                                sequence.
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pred. No. 1.6e
4; Mismatches
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The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC [RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerébrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC restenosis or asthma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lupus, multiple sclerosis, transplant/graft rejection, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC cultifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR cultifulations of a target gale and as a diagnostic tool to examine genetic conditions (e.g. asthma, allergic RNA in a cell. The present RNA sequence represents a human PKR cultifulations within diseased cells or to detect the presence of a condition of the company of the cultifulation of t
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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29-MAY-2001;
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                                                      sequence.
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; 2001US-0294412P.
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Sequence 17 BP; 2 A; 7 C; 3 G; 0 T; v g; 0 Other;

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Matches 11; Similarity Conservative 1.6%; 5 Score 15.4; Pred. No. 1 Mismatches .6e+03 DB 1; Length 17; Indels 0 Gaps 0

밁 S 1006 GATTCTCCTGTCTCAGC _ GAUUCUCCUGCCUCAGC 1022 17

ADL49965 protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease; prostaglandin D2 receptor; protein kinase PKR; cerebro Human PKR antisense oligonucleotide; 20-MAY-2004 ADL49965; standard; RNA; 17 substrate (first sequence #1079. entry) neurite growth PTGDR; IkappaB ВP

inhibitor; NOGO; kinase; IKK;

cord injury; cancer;
rheumatoid arthritis;

melanoma; lymphoma;

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RESULT 1934
ADL50214
ID ADL5021
XX
AC ADL5021
XC ADL5021
XX
DT 20-MAY-
DT 20-MAY-
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DT Human F
DE Human F
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W antisen
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Matches 13
antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord inj melanoma; lymphoma; glioma; inflammatory disease; rheumato
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a trayet gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR
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graft rejection; ischaemia; reperfusion; glomerulonephritis; seps
allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
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29-MAY-2001; 2001US-0294412P
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                                                                                                                                                  20-MAY-2004
                                                                                                                                                                                                                        ADL50214 standard;
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                                                                                                            substrate sequence
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                                                                                                                                                                                                                        RNA; 17
                                                                                                                                                entry,
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Pred. No. 1
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 cord injury; cancer;
rheumatoid arthritis;
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RESULT 1935 ADL50747

ADL50747 standard;

RNA;

ΒP

2×2×2×2×2×2×2×2

substrate

sequence entry)

#1861.

(first

antisense Human 20-MAY-2004 ADL50747;

prostaglandin D2 receptor; PTGI protein kinase PKR; cerebrovaso central nervous system injury;

lymphoma; glioma;

inflammatory

CNS injury; spinal cord injury; cancer; flammatory disease; rheumatoid arthritis

arthritis

oligonucleotide; neurite growth inhibitor; N ndin D2 receptor; PTGDR; IkappaB kinase; IKK;

NOGO;

cerebrovascular accident;

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202 TTGGTCAGGCTGGTCTC 218

UUGGCCAGGCUGGUCUC

17

Matches

Conservative

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that down regulate the expression or inhibit the function of a receptor for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR). I kappab kinase (IKK), or prottain kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR
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29-MAY-2001;
28-AUG-2001;
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                                                    Sequence 17 BP; 1 A;
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase o
in kinase PKR genes, for treating cancer and inflammatory disease
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                                                                                        sequence.
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2001US-0294412P.
2001US-0315315P.
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1.6%;
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Score 15.4;
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that down regulate the expression or inhibit the function of a receptor
(for a neurite growth inhibitor, NGGO, prostaglandin D2 receptor (PTGDR),
(FappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
invention are useful for treating: cerebrovascular accident, central
cerebrous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
(for invention are glioma), inflammatory disease (e.g. rheumatoid arthritis,
cerestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
(fiscase, lupus, multiple sclerosis, transplant/graft rejection,
cerebrousia/reperfusion injury, glomerulonephritis, sepsis, and allergic
conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
nucleic acids of the invention are also useful for down-regulating the
expression of a target gene and as a diagnostic tool to examine genetic
drifts and mutations within diseased cells or to detect the presence of a
target RNA in a cell. The present RNA sequence represents a human PKR
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Best Local (
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17 BP; 1 A;
                                                                                                                                                                                                         ADL49434 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                              substrate sequence.
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                                                                                                      Human PKR substrate sequence
                                                                                                                                       20-MAY-2004
                                                                                                                                                                                                                                                                                                                          201
                                                                                                                                                                                                                                                                                                                                                           1 Similarity
11; Conserv
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                                                                                                                                                                                                         RNA;
                                                                                                                                                                                                                                                                                                                                                                         1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                              4 C; 7
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                                                                                                      #548.
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Pred. No. 1
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       arthritis;
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ADL50197
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                       protein
central
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                               Human PKR
                                                                                                                                                                                                                    ADL50197;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 17
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                                                                                     antisense oligonucleotide;
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ise oligonucleotide; neurite growth inhibitor; NOGO;
|landin D2 receptor; PTGDR; IkappaB kinase; IKK;
| kinase PKR; cerebrovascular accident;
| nervous system injury; CNS injury; spinal cord inj
| nervous gystem injury; CNS injury; spinal cord inj
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                                                                                                                                 substrate
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                                                                                                                               sequence #1311.
                                                                                                                                                                             entry.
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Pred. No. 1.6e+03
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  cord injury; cancer;
rheumatoid arthritis;
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RESULT 1938
ADL50748
ID ADL5074
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AC ADL5074
XX
DT 20-MAY-
DX
DB Human P
XX
W antisen
KW prostag
KW prostag
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KW protein
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KW protein
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C that down regulate the expression or inhibit the function of a receptor

for a neurite growth inhibitor, NCGO, prostaglandin D2 receptor (PTGDR),

C IRappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the

invention are useful for treating: cerebrovascular accident, central

c invention are useful for treating: cerebrovascular accident, central

c invention are useful for treating: cerebrovascular accident, central

c invention are useful for treating: cerebrovascular accident, central

c invention are useful for treating: cerebrovascular accident, central

c invention are glioma), inflammatory disease (e.g. rheumatoid arthritis,

c restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune

disease, lupus, multiple sclerosis, transplant/graft rejection,

c disease, lupus, multiple sclerosis, transplant/graft rejection,

c disease, lupus, multiple sclerosis, transplant/graft rejection.

C conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The

nucleic acids of the invention are also useful for down-regulating the

c expression of a target gene and as a diagnostic tool to examine genetic

c drifts and mutations within diseased cells or to detect the presence of a

c substrare service.
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Best Local S
Matches 11
antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord inj melanoma; lymphoma; glioma; inflammatory disease; rheumato
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                                                                                                                                   ADL50748 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                substrate sequence.
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                                                                                                                  substrate sequence #1862
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                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
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                                                                                                                                                                                                                                     RNA;
                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                                                                                                                               1.6%;
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ptor, IkappaB kinase or
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  cord injury; cancer;
rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
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RESULT 1939
ADL49906
ID ADL4990
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AC ADL4990
AC ADL4990
DT 20-MAY-
XX
DE Human P
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Antisen
KW prostag
KW protein
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Best Local S
Matches 13
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29-MAY-2001;
28-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                      antisense oligonucleotide; neurite growth inhibitor;
prostaglandin D2 receptor; PTGDR; IkappaB kinase; IK
protein kinase PKR; cerebrovascular accident;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17 BP; 4 A;
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                                                                                                                                                                                                                                  ADL49906 standard;
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                                                                                                                     substrate
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2001US-0294412P.
2001US-0315315P.
                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                    RNA;
                                                                                                                   sequence
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les 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                   Indels
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                                                                                 NOGO;
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protein kinase PKR; cerebrovaso central nervous system injury;

lymphoma;

glioma;

inflammatory

CNS injury; spinal cord injury; flammatory disease; rheumatoid a

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RESULT 1940
ADL49929
ID ADL4992
XX ADL4992
XX ADL4992
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XX ADL4992
XX Human P
XX Human P
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KW Antisen
KW prostag
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention comprises nucleic acids (e.g. antisense oligonucleotides) CC that down regulate the expression or inhibit the function of a receptor CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC IkappaB kinase (IKX), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease (e.g. rheumatoid arthritis, CC ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC cutofic acids of the invention are also useful for down-regulating the CC expression of a target gene and as a diagnostic tool to examine genetic CC drifts and mutations within diseased cells or to detect the presence of a CC cutofic acids of a call. The present RNA sequence represents a human PKR combattage and as cell. The present RNA sequence represents a human PKR combattage and as cell.
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase opposed kinase PKR genes, for treating cancer and inflammatory disease
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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 antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 17
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                                                                                                             Human PKR substrate sequence #1043
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Pred. No. 1.
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The invention comprises nucleic acids (e.g. antisense oligonucleotides)
CC that down regulate the expression or inhibit the function of a receptor (For a neurite growth inhibitor, NoGO, prostaglandin D2 receptor (PTGDR), CC IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lupus, multiple sclerosis, transplant/graft rejection, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC cucleic acids of the invention are also useful for down-regulating the CC expression of a target gene and as a diagnostic tool to examine genetic CC drifts and mutations within diseased cells or to detect the presence of a CC categet RNA in a cell. The present RNA sequence represents a human PKR
Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                            Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                05-APR-2001; 2001US-00827395.
29-MAY-2001; 2001US-0294412P-
28-AUG-2001; 2001US-0315315P-
                                                                                                                                                                                                                                                                                                                                                                                                                                        protein kinase PKR genes,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2003-058513/05
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                                       Sequence 17
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                                       BP; 1 A;
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 Score 15.4;
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     DB 1;
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 Length 17;
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Matches
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728
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                        Pred.
                Mismatches
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RESULT 19
ADL49950
antisense oligonucleotide; neurite growth inhibitor; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKs protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal conmelanoma; lymphoma; glioma; inflammatory disease; rhe
                                                                                                                    Human PKR
                                                                                                                                                                                                   ADL49950;
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                                                                                                                      substrate sequence #1064.
                                                                                                                                                              (first
                                                                                                                                                            entry)
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                                                               IKK;
  cord injury; cancer;
rheumatoid arthritis;
                                                                                  NOGO
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RESULT 1942
ADL4943
ID ADL4943
XX
AC ADL4943
XC ADL4943
XX
DT 20-MAY-
XX
DE Human P
XX
W antisen
KW prostag
KW prostag
KW protein
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CC that down regulate the expression or inhibit the function of a receptor
CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
CC IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC restenosis or asthma), Crohn's disease (e.g. rheumatoid arthritis,
CC disease, lupus, multiple sclerosis, transplant/graft rejection,
CC disease, lupus, multiple sclerosis, transplant/graft rejection,
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC cucleic acids of the invention are also useful for down-regulating the
CC expression of a target gene and as a diagnostic tool to examine genetic
CC drifts and mutations within diseased cells or to detect the presence of a
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Best Local
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protein kinase PKR; cerebrovascular accident; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease;
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                     antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 17
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                                                                                                                                                                                                                                                                                                                                           standard;
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                                                                                                                                                                       substrate sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 17
                             cord injury; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Fosnaugh
     rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
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ADH54043/c
ID ADH5404
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Matches Query Match Best Local

11;

Conservative

5

Similarity

1.6%; 64.7%;

Score 15.4; Pred. No. 1

DB 1; 1;

Length 17; Indels

0

Gaps

0

ed. No. 1.6e+03 Mismatches

701 CAAGTTATTCTCCTGCC 717

H

CAAGUGAUUCUCCUGCC

17

ADH54043 standard;

DNA;

17 ΒP

25-MAR-2004 ADH54043;

(first entry)

human; neurodegenerative disease; urokinase plasminogen activator; uPA; gamma-synuclein; SNCG; insulin degrading enzyme; IDB; kinesin-like protein 1; KNSL1; lysosomal acid lipase; LIPA; kinesin-like protein 1; KNSL1; lysosomal acid lipase; LIPA; tumour necrosis factor receptor SF6; TNFRSF6; Alzheimer's disease; PCR;

Human neurodegenerative disease-related sequencing

primer

SeqID170.

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The invention comprises nucleic acids (e.g. antisense oligonucleotides)
that down regulate the expression or inhibit the function of a receptor
for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
[KappaB kinase (IKX), or protein kinase PKR. The nucleic acids of the
invention are useful for treating: cerebrovascular accident, central
nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,
crestenosis or asthma), Crohn's disease (e.g. rheumatoid arthritis,
crestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
disease, lupus, multiple sclerosis, transplant/graft rejection,
cischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic
conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
nucleic acids of the invention are also useful for down-regulating the
expression of a target gene and as a diagnostic tool to examine genetic
drifts and mutations within diseased cells or to detect the presence of a
target RNA in a cell. The present RNA sequence represents a human PKR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              05-APR-2001;
29-MAY-2001;
28-AUG-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                       Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           substrate; ds.
Sequence 17 BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                       Claim
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-058513/05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                03-APR-2002; 2002WO-US010512
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WO200281628-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         restenosis; asthma; Crohn's disease;
                                     substrate sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                     59; SEQ ID NO 2963; 317pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Chowrira B,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2001US-0294412P.
2001US-0315315P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2001US-00827395
6 C; 3 G; 0 T; 5 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         diabetes;
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RESULT 1944
ADK13186/c
ID ADK13186 standard; DNA; 17 BE
XX
AC ADK13186;
XX
DT 20-MAY-2004 (first entry)
XX
DE Human glioma endothelial mar)
XX
KW glioma; brain tissue; neoplar
KW anticancer; antiglioma; immu
KW multi-drug sensitive glioma;
XX
OS Homo sapiens.
OS Synthetic.
XX
PN W02004016758-A2.
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Best Local S
Matches 16
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25-OCT-2001; 2001US-0348065P.
02-NOV-2001; 2001US-0336983P.
08-NOV-2001; 2001US-0336929P.
08-NOV-2001; 2001US-0338010P.
09-NOV-2001; 2001US-0338363P.
04-DEC-2001; 2001US-0337052P.
28-MAR-2002; 2002US-0368919P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 This invention relates to a novel method of determining a predisposition for or the occurrence of neurodegenerative disease comprising detecting in a target nucleic acid obtained from the subject the presence of an allelic variant of polymorphic regions of human genes selected from urokinase plasminogen activator (uPA), gamma-synuclein (SNCG), insulin degrading enzyme (IDE), kinesin-like protein 1 (KNSL1), lysosomal acid lipase (LIPA) and tumour necrosis factor receptor SF6 (TMFRSF6). The method is useful in determining the presence or predisposition to a neurodegenerative disease, particularly Alzheimer's disease. The present sequence is that of a sequencing primer which was used for sequencing of a region of the human IDE gene in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            04-DEC-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Determining a predisposition for or the occurrence of neurodegenerative disease, particularly Alzheimer's disease, comprises determining the presence of a polymorphism in the uPA, SNCG, IDE, KNSL1, LIPA or TNFRSF6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Becker KD,
Bertram L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             25-OCT-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 3;
                                                                                                  glioma; brain tissue; neoplastic; glioma endothelial marker; GEM;
anticancer; antiglioma; immune response; cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (GEHO ) GEN
                                                                                   multi-drug sensitive glioma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   2004-060538/06
                                                                                                                                                                                                                                                                                                                                                            646
                                                                                                                                                                                                                                                                                                                            17
                                                                                                                                                                                                                                                                                                                                                                                          l Similarity 94.:
16; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                         17
                                                                                                                                                                                                                                                                                                                                                            AGGCTGGAGTGCAGTGG 662
                                                                                                                                                                                                                                                                                                                            ACGCTGGAGTGCAGTGG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SEQ ID NO 170; 205pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Velicelebi G,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  HOSPITAL CORP
                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2002US-00282174
                                                                                                                                                 endothelial marker (GEM) long tag SEQ ID NO:364
                                                                                                                                                                                                                                                                                                                                                                                                           1.6%;
94.1%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                         8 C; 3 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Ellliott KJ, Wang
Mullin KM, Sampson
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                                                                                                                                                                                                                                               ВP
                                                                                                                                                                                                                                                                                                                                                                                           0
                                                                                                                                                                                                                                                                                                                                                                                                           Score 15.4;
Pred. No. 1.
                                                                                   human; long tag;
                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                           Length 17
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Human ER+ 20-MAY-2004

breast cancer differentially expressed sequence #317

ADL82347;

0

(first entry)

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CC gene (I) in a first brain tissue sample (T) suspected of being CC enothelial markers (GEMS)) as given in specification, and comparing the CC endothelial markers (GEMS)) as given in specification, and comparing the CC expression of (I) in (T) with expression of (I) in second normal brain CC tissue sample (R), where increased expression of (I) in (T) relative to CC (R), identifies (T) as likely to be neoplastic. Also described: (I) CC treating (M2) glioma involves contacting cells of the glioma with an CC identifying (M3) a test compound as potential anticancer or antiglioma (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC identifying test compound as a potential anticancer drug if it decreases the expression of at least one gene; and (M4) a test compound with the cell which expresses (CC identifying the test compound as a potential anticancer drug if it decreases the expression of at least one gene; and (A) inducting at test compound with the cell which expresses mRNA of at least one gene and CC identifying the test compound as a potential anticancer drug if it decreases the expression of at least one gene; and (A) inducing (M5) an immune response to glioma involves administering to a mammal, a protein CC identifying the expression of at least one gene; and (A) inducing (M5) an CC identifying the expression of at least one gene; and (A) inducing (M5) an CC identifying in diagnosing glioma. (M2) is useful for treating multication of glioma or an amammal who has had a superior diagnosing glioma or in a mammal who has had can be gene inducers and immune response to a glioma in a mammal having glioma or in a mammal who has had can gene in invention. The present sequence represents a human GEM long tag oligonucleotide, which is used in the exemplification of the
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                                                                                                                                                                                                                                                                                                         Best Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                             Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention describes a method (M1) for aiding in th of glioma. (M1) involves detecting an expression product of at gene (I) in a first brain tissue sample (T) suspected of being
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Diagnosing glioma by detecting expression product of any one of 255 genes, glioma endothelial markers, in brain tissue sample suspected of being neoplastic, and comparing the expression with expression in normal brain tissue sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15-AUG-2002; 2002US-0403390P.
01-APR-2003; 2003US-0458978P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Example 2; SEQ ID NO 364; 114pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (GENZ )
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                                                                                                                                   ADL82347 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17
                                                                                                                                                                                                                                                                   646 AGGCTGGAGTGCAGTGG 662
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UNIV JOHNS HOPKINS.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Wang CJ,
                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                   BP; 2 A;
                                                                                                                                                                                                                                                                                                                                                                                     9 C;
                                                                                                                                                                                                                                                                                                                           1.6%;
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0; Mismatches
                                                                                                                                                                                                                                                                                                                                               Score 15.4;
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                                                                                                                                                                                                                                                                                                                                                                                       T; 0
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                                                                                                                                                                                                                                                                                                                               1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                       0 Other;
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                                                                                                                                                                                                                                                                                                                                                 Length 17;
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                                                                                                                                                                                                                                                                                                               0
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least one
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ADL82349/c
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The invention relates to a composition which contains at least one vector (B) containing a nucleic acid (I) associated with breast cancer. The vector (B), also polypeptides (II) encoded by (I), are used for treatment of breast cancer. Arrays based on (I), (II), or their fragments, and (II) specific antibodies (Ab) are used to predict characteristics (e.g. invasiveness or stage) of breast cancer, and (I), or its fragments, are used to modulate characteristics of such cells; to identify breast cancer genes and to detect breast cancer (by detecting polymorphic nucleic acid or its products). The present sequence represents a human ER+ breast cancer differentially expressed sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Vector containing nucleic acid associated with breast cancer, useful treating, diagnosing and characterizing breast cancer, also related polypeptides and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  09-JAN-2002; 2002US-0348053P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             08-JAN-2003; 2003US-00339782
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WPI; 2004-069003/07
                       Goodman LJ,
                                                                                                                                                     US2003166026-A1
                                                                                                                                                                                                      gene therapy;
                                                                                                                                                                                                                                                                                    ADL82349
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 1; SEQ ID NO 318; 61pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      04-SEP-2003
                                                  (LYNX-) LYNX THERAPEUTICS INC
                                                                                                  08-JAN-2003; 2003US-00339782
                                                                                                                             04-SEP-2003
                                                                                                                                                                              Homo sapiens
                                                                                                                                                                                                                               Human ER+ breast cancer differentially expressed sequence #319
                                                                                                                                                                                                                                                          20-MAY-2004
                                                                                                                                                                                                                                                                                                           ADL82349 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      sapiens
                                                                                                                                                                                                                                                                                                                                                                                                 224 CCCGACCTCAGATGATC 240
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 3 A; 4 C; 7 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                           1.6%;
llarity 94.1%;
Conservative
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                       Bowen BA
                                                                           2002US-0348053P
                                                                                                                                                                                                                                                          (first
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               breast cancer; human;
                                                                                                                                                                                                       breast cancer; human;
                                                                                                                                                                                                                                                                                                        DNA; 17
                                                                                                                                                                                                                                                          entry)
                                                                                                                                                                                                                                                                                                                                                                                                                           <u>0</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 15.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
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                                                                                                                                                                                                       ER+ breast cancer
                                                                                                                                                                                                                                                                                                                                                                                                                                       .6e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                   1; Length 17;
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RESULT 1947
ADL82453/c
ID ADL8245
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to a composition which contains at least one vector (B) containing a nucleic acid (I) associated with breast cancer. The vector (B), also polypeptides (II) encoded by (I), are used for treatment of breast cancer. Arrays based on (I), (II), or their fragments, and (II) specific antibodies (Ab) are used to predict characteristics (e.g. invasiveness or stage) of breast cancer, and (I), or its fragments, are used to modulate characteristics of such cells; to identify breast cancer genes and to detect breast cancer (by detecting polymorphic nucleic acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Vector containing nucleic acid associated with treating, diagnosing and characterizing breast polypeptides and antibodies.
        The invention relates to a composition which contains at least one vector (B) containing a nucleic acid (I) associated with breast cancer. The vector (B), also polypeptides (II) encoded by (I), are used for treatment of breast cancer. Arrays based on (I) (II), or their fragments, and (II) -specific antibodies (Ab) are used to predict characteristics (e.g. invasiveness or stage) of breast cancer, and (I), or its fragments, are used to modulate characteristics of such cells; to identify breast cancer genes and to detect breast cancer (by detecting polymorphic nucleic acid or its products). The present sequence represents a human ER+ breast
or its products). The cancer differentially
                                                                                                                                                                                                                                        Vector containing nucleic acid associated with breast cancer, useful treating, diagnosing and characterizing breast cancer, also related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ADL82453 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 17 BP; 4 A; 7 C; 3 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                or its products). The present sequence represents a human ER+ breast cancer differentially expressed sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 1; SEQ ID NO 320; 61pp; English.
                                                                                                                                                                                                                     treating, diagnosing and characterizing polypeptides and antibodies.
                                                                                                                                                                                                                                                                                                                            Goodman LJ,
                                                                                                                                                                                                                                                                                                                                                                                               09-JAN-2002; 2002US-0348053P
                                                                                                                                                                                                                                                                                                                                                                                                                                 08-JAN-2003; 2003US-00339782.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human ER+ breast
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ADL82453;
                                                                                                                                                                                      Claim 1; SEQ ID NO 424; 61pp; English.
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                                                                                                                                                                                                                                                                                                                            Bowen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ds;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        cancer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      breast cancer;
                                                                                                                                                                                                                                                                                                                            BA;
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        expressed sequence
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Matches 16
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                                                                                                                                                                                                                                         The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human glycoprotein VI (platelet) (GP6; GPIV;GPVI) DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Identifying a subject at risk of breast cancer by detecting the or absence of one or more nucleotide polymorphic variations, use diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-NOV-2002;
24-JUL-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     breast cancer; cytostatic; gene therapy; GP6; GPIV; GPVI; chromosome 19q13.4; 88;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Extend
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                                                                                                                                                                                                    Sequence 17 BP; 3 A; 7 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2004-441082/41.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17
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16; Conserv
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                                                                                                    16;
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                                                  AGTGCTGGGATTACAGG 407
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                B₽;
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2003US-0490234P.
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Pred. No. 1.6e+03;
                                                                                                                            Score
Pred.
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PCR; pr
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Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                breast cancer; cytostatic; gene therapy; human; chromogranin secretogranin 1; SCG1; chromosome 20pter-p12; ss; PCR; primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Identifying a subject at risk of breast cancer by detecting the or absence of one or more nucleotide polymorphic variations, use diagnosing, preventing and/or treating breast cancer.
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                                                      breast cancer; cytostatic; gene therapy; human; chromogranin B; secretogranin 1; SCG1; chromosome 20pter-p12; ss; PCR; primer; S
                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 4 A; 5 C; 4 G; 4 T; 0 U; 0 Other;
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24-JUL-2003;
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                                         nucleotide
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                                                                                                                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                                                                                                                                                              Conservative
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2003US-0490234P.
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                                                                                                                           (first
                                                                                               73 used to genotype human chromogranin B polymorphism.
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                                         polymorphism.
                                                                                                                           entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          genotype human chromogranin B polymorphism.
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Pred. No. 1.
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                                                         primer; SNP;
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Homo sapiens

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                                                                                                                                                                                                                                                                                                                                                                                    RESULT 1951
ADP08765
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human chromogranin B (CHGB;secretogranin 1;SCG1) DNA which is located at chromosomal position 20pter-p12.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                             breast cancer; cytostatic; gene therapy; human; platelet glycoprotein VI; GP6; GPIV; GPVI; chromosome 19q13.4; ss; PCR; primer; SNP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 17 BP; 5 A; 6 C; 2 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 5; Page 103; 286pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-NOV-2002; 2002US-0429136P.
24-JUL-2003; 2003US-0490234P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO2004047767-A2
                         Roth RB,
                                                                              25-NOV-2002; 2002US-0429136P
24-JUL-2003; 2003US-0490234P
                                                                                                                      25-NOV-2003; 2003WO-US037966
                                                                                                                                                  10-JUN-2004
                                                                                                                                                                             WO2004047767-A2
                                                                                                                                                                                                                                                                                      Extend
                                                                                                                                                                                                                                                                                                                26-AUG-2004 (first entry)
                                                                                                                                                                                                                                                                                                                                                                       ADP08765 standard; DNA; 17
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2004-441082/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2004-441082/41
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    966
                                                                                                                                                                                                                                                                                                                                                                                                                                          17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16;
                                                                                                                                                                                                                               nucleotide polymorphism.
                                                                                                                                                                                                                                                                                     primer 102 used to genotype human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    SEQUENOM INC
                                                    SEQUENOM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                         TGGGATTACAGGCGTTA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                          TGGGATTACAGGCGTGA 882
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Nelson MR,
                         Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Conservative
                                                    INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            94.1%;
                           Braun
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             <u>,,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Kammerer
                           Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SM,
                                                                                                                                                                                                                                                                                     glycoprotein VI polymorphism
                           , MS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Reneland
                         Reneland
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 17
                           ₽,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0
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Matches
                                                                                           Query Match
Best Local Similarity
                                                                                                                                                                                                                                           as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human glycoprotein VI (platelet) (GP6; GPIV;GPVI) DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to a novel method for identifying a subject at riof breast cancer which comprises detecting the presence or absence of or more polymorphic variations associated with breast cancer in a nucle acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer,
                                                                                                                                                                                    Sequence 17 BP; 5 A; 3 C; 6 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Example 3; Page 84; 286pp; English.
1032 AGCTGGGATTACGGGCA 1048
                                                          16;
                                                                 Conservative
                                                                                        1.6%;
                                                                 <u>,</u>
                                                                                              Score 15.4; DB 1;
Pred. No. 1.6e+03;
                                                              Mismatches
                                                                                                                            DB 1;
                                                                 ۲.
                                                                                                                         Length 17;
                                                                 Indels
                                                                 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             bject at risk bsence of one in a nucleic
                                                                 Gaps
                                                                 0,
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RESULT 1952
ADO80011
                     26-AUG-2004
                                                              ADO80011 standard; DNA; 17
CENPC1
                                          AD080011;
                                                                                                                   ب
extend
                                                                                                                   AGCTGGGATTACAGGCA
                   (first entry)
primer
 #62.
                                                                                                                   17
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WO2004047514-A2 10-JUN-2004.

Cytostatic; Gene therapy; breast cancer; human; DLG1; KIAA0783; DPF CENPC1; SNP; single nucleotide polymorphism; centromere protein C1; Centromere autoantigen C1; chromosome 4q12-q13.3; extend; primer; s

(SEQU-) SEQUENOM INC

25-NOV-2002; 2002US-0429136P 24-JUL-2003; 2003US-0490234P

25-NOV-2003; 2003WO-US037943.

Roth RВ, Nelson MR, Braun A, Kammerer SM,

R ;

Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the DLG1, KIAA0783, DPF3 or CENPC1 regions which are associated with breast cancer in a nucleic acid sample from a

6; Page 91; 227pp; English.

The present invention relates to a method for identifying a subject at risk of breast cancer. The method comprising detecting the presence or absence of one or more polymorphic variatations associated with breast cancer in a nucleic acid sample from a subject. The nucleic acid sample comprises the DLG1 region (ADO79402), KIAAO783 region (ADO79403), DPF3 (ADO79404) ç (ADO79405). gene

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CC large homolog 1 (Drosophila)) is also known as synapse-associated protein CC 97, hdlg or SAP97. DLG1 has been mapped to chromosomal position 3q29. The CC gene KIAA0783 is also known as PHF14 and PHD finger protein 14. KIAA0783 CC has been mapped to chromosomal position 7p21.3. The KIAA0783 protein is a CC novel gene with unknown function, however, being a zinc finger protein, CC it likely to be a transcription factor. The gene PF3 (D4, zinc and CC double PHD fingers, family 3) is also known as CERD4, cer-d4, FLJ14079 CC and 2810403B03Rik. DPF3 is a Rho family guanine-nucleotide exchange CC factor. DPF3 has been mapped to chromosomal position 14q24.3-q31.1. The CC gene CENPC1 (centromere protein C1) is also known as Centromere CC autoantigen C1. CENPC1 has been mapped to chromosomal position 4q12-CC (finetochore plate. The CENPC1 protein is required for maintaining proper CC kinetochore plate. The CENPC1 protein is required for maintaining proper CC kinetochore size and a timely transition to anaphase. The method is CC useful for identifying a subject at risk of breast cancer, for early CC diagnosis, prevention and treatment of breast cancer, to analyze and CC predict a response to a breast cancer treatment, and in clinical drug trials. The present sequence was used in an example from the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RESULT 1953
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cytostatic; Gene therapy; breast cancer; human; DLG1; KIAA0783; DPF3; CENPC1; SNP; single nucleotide polymorphism; synapse-associated protein 97; hdlg; SAP97; chromosome 3q29; extend;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                             10-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DLG1 extend
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              26-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ADO79480 standard; DNA; 17
                                                                                                                                                   Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the DLG1, KIAA0783, DPF3 or CENPC1 regions which are associated with breast cancer in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                               25-NOV-2002;
24-JUL-2003;
                                                                                                                                                                                                                                                                                                                                                                                                     25-NOV-2003; 2003WO-US037943
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WO2004047514-A2
                                                                                                                                                                                                                               WPI; 2004-441037/41.
                                                                                                                                                                                                                                                                                                       (SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          389
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                l Similarity
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                                                                                                                                                                                                                                                                                                         SEQUENOM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           88.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AGAGTGCTGGGATTACA 17
                                                                                                                                                                                                                                                                   Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      primer #12.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                             2002US-0429136P.
2003US-0490234P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            5 A;
                                                                                                                                                                                                                                                                                                         INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            2 C; 6 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                   Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          405
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 15.4; DB 1;
Pred. No. 1.6e+03;
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                                                                                                                                                                                                                                                                     Kammerer SM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                       Reneland
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length
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The present invention relates to a method for identifying a subject risk of breast cancer. The method comprising detecting the presence absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The nucleic acid sample from a subject.

sample or a

The present invention relates to a method risk of breast cancer. The method comprisi

relates to a method for identifying a subject The method comprising detecting the presence polymorphic variations associated with breast

or

breast of one

cancer. more

Example

6

Page 91;

227pp;

English.

Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the DLG1, KIAA0783, DPF3 or CENPC1 regions which are associated with breast cancer in a nucleic acid sample from a

Example 3;

Page

73;

227pp;

English.

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RESULT 1954
ADO80017
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CC comprises the DLG1 region (ADO79402), KIAAO783 region (ADO79403), DPF3
CC region (ADO79404) or CENPC1 region (ADO79405). The gene DLG1 (discs, CC large homolog 1 (Drosophila)) is also known as synapse-associated protein CC 97, Adlg or SAP97. DLG1 has been mapped to chromosomal position 3q29. The CC gene KIAAO783 is also known as PHF14 and PHD finger protein 14. KIAAO783 (C novel gene with unknown function, however, being a zinc finger protein, is a CC novel gene with unknown function, however, being a zinc finger protein, CC double PHD fingers, family 3) is also known as CERD4, cer-d4, FLJ14079 (C double PHD fingers, family 3) is also known as CERD4, cer-d4, FLJ14079 (C gene CENPC1 (centromere protein C1) is also known as CERD4, cer-d4, FLJ14079 (C gene CENPC1 (centromere protein C1) is also known as Centromere (C gutoantigen C1. CENPC1 has been mapped to chromosomal position 14q24.3-q31.1. The CC useful for identifying a subject at risk of breast cancer, for early CC diagnosis, prevention and treatment of breast cancer, to analyze and CC predict a response to a breast cancer treatment, and in clinical drug trials. The present sequence was used in an example from the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                             Cytostatic; Gene therapy; breast cancer; human; DLG1; KIAA0783; DPF3; CENPC1; SNP; single nucleotide polymorphism; centromere protein C1; Centromere autoantigen C1; chromosome 4q12-q13.3; extend; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AD080017
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADO80017;
                                                                                                                                                           WPI; 2004-441037/41.
                                                                                                                                                                                                                                               25-NOV-2002; 2002US-0429136P
24-JUL-2003; 2003US-0490234P
                                                                                                                                                                                                                                                                                          25-NOV-2003; 2003WO-US037943
                                                                                                                                                                                                                                                                                                                          10-JUN-2004.
                                                                                                                                                                                                                                                                                                                                                    WO2004047514-A2
                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CENPC1 extend primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       26-AUG-2004
                                                                                                                                                                                                                    (SEQU-) SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      877 GCGTGAGCCACCACGCC 893
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   16;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          GCGTGAGCCACCACACC
                                                                                                                                                                                       Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BP; 4 A; 8 C; 4 G; 1 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           #68
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 94.1%;
                                                                                                                                                                                         Braun A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                          Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    No. 1.6e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  15.4;
                                                                                                                                                                                          MS,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                          Reneland
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0,
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RESULT 1955
AAQ20109
ID AAQ2010
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local Simi
Matches 16;
                                                                                                                                                                                                                                                                                                                                                                                                                         deoxyribonucleic acid; major groove; ethanoamino group; tumour necrosis factor; receptor; messenger RNA; aziridinylcytosine; cross-linking group; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Cross-linking oligomer 943 to target human TNF Receptor mRNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          01-APR-1992
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAQ20109 standard; DNA; 18
WPI; 1992-007480/01.
                             Matteucci MD,
                                                                                           25-MAY-1990;
14-JAN-1991;
                                                                                                                                                                                                                                                                                 modified_base
                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic
                                                                                                                                           25-MAY-1990;
                                                                                                                                                                        12-DEC-1991.
                                                                                                                                                                                                       WO9118997-A.
                                                                                                                                                                                                                                                                                                                                               modified_base
                                                            (GILE-) GILEAD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  871 TTACAGGCGTGAGCCAC 887
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TTACAGGTGTGAGCCAC 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 4 A; 4 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                             Krawczyk S;
                                                              SCIE INC
                                                                                           90US-00529346.
91US-00640654.
                                                                                                                                           90US-00529346
                                                                                                                                                                                                                                                                                   /mod_base= OTHER
/note= "N-methyl-8-oxo-2'-deoxyadenine"
18
                                                                                                                                                                                                                                                                                                                                                                 Location/Qualifiers
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/mod_base= OTHER
                                                                                                                                                                                                                                       note=
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                                                                                                                                                                                                                                     "N4N4-ethanocytosine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP.
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Pred. No. 1.
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RESULT 1956
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ID AAQ3044
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KW HPV; ma
XX FH Key
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Best Local Similarity
Matches 16; Conserva
                                                                                                                                                                                                                                                            23-NOV-1990;
18-JAN-1991;
08-APR-1991;
17-APR-1991;
17-APR-1991;
17-APR-1991;
27-SEP-1991;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The oligomer was designed to target human TNF receptor mRNA beginning at nucleotide 2354 and to covalently cross-link to the target via the N4N4-ethanocytosine group. See also AAQ20108
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                25-MAR-2003
07-DEC-1992
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAQ30448 standard; DNA; 18 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 18 BP; 1 A; 1 C; 0 G; 16 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New sequence-specific non-photo-activated crosslinking agents -
the major groove of duplex DNA and are esp. useful for treating
                                      New oligomers contg. modified bases -doublet in a DNA duplex, for treating herpes malignancy and inflammation.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human tumour necrosis factor receptor mRNA; AIDS; modified; HIV; RSV; HPV; malignancy; hepatitis; inflammation; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Oligomer TNFR943 for forming triplex with HUMNFR target duplex.
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Claim 12; Page 72; 77pp; English
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                                                                                                                                  WPI; 1992-217083/26.
                                                                                                                                                                         Froehler B, Krawczyk S,
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(first entry)
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91US-00643382.
91US-00683420.
91US-00686544.
91US-00686546.
91US-00686547.
91US-00766733.
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/note= "N6 methyl-8-oxo-2'
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                                                                                                                                                                             Matteucci MD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 15.4;
Pred. No. 1.
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                                                               which form a triplex with and diagnosing HIV, hepati
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.7e+03
                                                                                                                                                                           Milligan
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                                                               x with G-C
hepatitis,
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Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The synthetic oligomer is capable of forming a triplex at physiological pH with a purine rich target sequence by coupling into the major groove of the duplex. The specific target sequence of this oligomer is the human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            neoplasia; mutant; target nucleotide; neck cancer; head cancer; saliva test, primer; PCR; amplification.
                                  This is an exemplary oligonucleotide primer, for use in the detection of neoplasmic related gene mutations. There are over 40 known protonocogenes and suppressor genes to date, which control growth, development, and cell differentiation. Regulation of these genes can, under certain circumstances, be altered and normal cells can assume neoplastic growth characteristics. The invention provides a method for detecting a neoplastic disorder of the head and neck or lung in a subject. The detection of a target mutant nucleotide sequence in the saliva is indicative of a neoplastic disorder of the head, neck or lung. This allows early detection and therefore treatment of the preneoplasia.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Exemplary oligonucleotide primer D9S737 (Rev).
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                                                                                                                                                                                                                 Disclosure; Page 28;
                                                                                                                                                                                                                                                                                               WPI; 1999-551428/46
      chemoprevention or chemotherapy
                      This allows early detection and or cancer, and can also be used
                                                                                                                                                                                                                                                               Detection of
                                                                                                                                                                                                                                                                                                                                                                                                10-MAR-1998;
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16; Conser
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                                                                                                                                                                                                                                                                                                                                                                  HOPKINS SCHOOL
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Pred. No. 1.
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                       monitor high risk
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               hybridization;; chemotherapy;
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                                                                                                                                                                                                                                                                 genetic mutation associated
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               lung cancer;
early detect:
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                      undergoing
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Best Local Similarity
                                                                                                                          Matches
                                                                                                                                          Query Match
                                                                                                                                                                                       The present invention describes a method for identifying compounds which modulate the activity of epidermal growth factor-containing fibrillin like extracellular matrix protein 1 (BFEMP1). The human BFEMP1 coding and protein sequences are also provided. Compounds of the invention can be used in the treatment of macular degeneration and other diseases related to EFEMP1. The present sequence is a PCR primer for a fragment of the
                                                                                                                                                                                                                                                                                          Screening fibrillin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence
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                   AAH40898;
                                                                                                                                                              Sequence 18
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                                                                                                                                                                                                                                                                                                                                        Stone
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                                                                                                                                                                                                                                                                                                                                                                               28-MAY-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human;
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                                     AAH40898
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                                                                                                      971 CGGCTCACTGCAACCTC 987
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                                                                                                                                                                                                                                                                               for treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             EGF-containing fibrillin-like extracellular matr: macular degeneration; chromosome 2; PCR primer;
                                                                                                                                                                                                                                                             1; Page 67; 92pp;
                                                                                                                                   Similarity
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                                     standard; DNA;
                                                                                   CAGCTCACTGCAACCTC
                                                                                                                                                                                                                                                                                        assays to identify compounds that modulate EGF-containing like extracellular matrix protein 1 bioactivity, which ar
                                                                                                                                                                                                                                                                                                                                         Sheffield
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                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         coding
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                                                                                                                                                                                                                                                                              or preventing macular degeneration
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                                                                                                                                                                0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0 Other
                                                                                                                                             DB 1;
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                                                                                                                                            Length 18;
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                                                                                                                           Gaps
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14-AUG-2001

(first

Single nucleotide polymorphism; SNP; single nucleotide primer extension; SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia; Lesch Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia;

polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; ss

SNP specific lower PCR primer SEQ ID

3694.

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AAH38514/c
ID AAH385
XX
AC AAH385
XX
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                                                                                                                                                                                                                                                                                                                                                                                                                                   CC SNP flanking sequence, the SNPE primer is used as a genotyping primer.

CC SNP flanking sequence, the SNPE primer received as a genotyping primer.

CC The oligonucleotides are useful for genotyping a nucleic acid sample by gerforming a single-nucleotide primer extension reaction. The colliquid of the presence absence or coligonucleotides are useful for determining the presence absence or coligonucleotides are useful for determining the presence absence or coligonucleotides are useful for determining the presence absence or coligonucleotides and for genotyping nucleic acid samples, for e.g. to conserve the presence absence or coligonucleotides and for genotyping nucleic acid samples, for e.g. to coligonal phanotypic traits include diseases e.g. coligonal phanotypic traits include diseases e.g. coligonal phanotypic traits include diseases e.g. coligonal phanotypic traits include yndrome, muscular constrophy, familial hypercholesterolaemia, polycystic kidney disease, costeogenesis imperfecta and acute intermittent porphyria. Phenotypic craits also include symptoms of or susceptibility to multifactorial coligonal phanotypic craits also include symptoms of or susceptibility to multifactorial coligonal phanotypic coligonal phanotyp
                                                                                                                                                                                                                                                                                Query Match
Best Local S
Matches 16
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                                                                     AAH38514 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                         Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 1; Page 68; 83pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New genotyping oligonucleotide, useful for detecting the presence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   15-OCT-1999;
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16; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                    containing DNA sequence
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Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                  Mismatches
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AAH38514

0

RESULT 1961 AAH40802

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AAH40802 standard;

DNA; 18

AAH40802

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947 18

GGCTGGAGTGCAATGGC 963

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Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking CC sites of single nucleotide polymorphisms SNPs. The present invention CC includes kits for determining the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by coligonucleotides are useful for reprotyping a nucleic acid sample by cc diagnatity of a SNP and for genotyping nucleic acid sample by cc diagnatity of a SNP and for genotyping nucleic acid samples, for e.g. to cligonucleotides are useful for determining the presence, absence or cc didnitity of a SNP and for genotyping nucleic acid samples, for e.g. to cligonucleotides aponotyping nucleic acid samples, for e.g. to cligonucleotides aponotyping primer extension reaction. The cc assess by association analysis the genotype of an individual or group of clidity duals, having a pathological phenotypic traits suspected of being cagemanglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular dystrophy, familial hypercholesterolemia, polycystic kidney disease, costeogenesis imperfecta and acute intermittent porphyria. Phenotypic traits also include symptoms of or susceptibility to multifactorial confisametion, cancer, nervous system diseases and infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic confiscence in the present sequence represents a PCR primer specific for a termity analysis. The present sequence represents a PCR primer specific
Matches
                                     Query Match
Best Local Similarity
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                                                                                                                                                         Sequence 18 BP; 3 A; 10 C; 2 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 1; Page 56; 83pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
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16;
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Conservative
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Pred. No. 1.
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    Mismatches
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                                             1.7e+03;
                                                                                  DB
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                                                                          Length 18;
    Indels
    0,
    Gaps
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ABK27429/c
ID ABK27429 standard; DNA; 18
XX
                                                                                                                                                                                                                                                                             Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide cc primer extension (SNPB) primers, and the sequences of regions flanking sites of single nucleotide polymorphisms SNPs. The present invention cc includes kits for determining the presence of a SNP using the CC oligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by coligonucleotides are useful for determining the presence, absence or cc identity of a SNP and for genotyping nucleic acid sample by cc individuals, having a pathological phenotypic trait suspected of being caused by one or more SNPs. Phenotypic trait suspected of being caused by one or more SNPs. Phenotypic traits include diseases e.g. cc agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular cc diseases include symptoms of or susceptibility to multifactorial diseases of which a component is or may be genetic such as autoimmune c inflamation, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and cc for a human SNP containing DNA seminerce
                                                                                                                                   S
                                                                                                     밁
                                                   RESULT 1962
                                                                                                                                                                                   Query Match
Best Local
                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia; polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 1; Page 68; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2001-290930/30.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  13-OCT-2000; 2000WO-US028436.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Single nucleotide polymorphism; SNP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           SNP specific lower PCR primer SEQ ID
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                                                                                                                                                                                                                                                                       for a human SNP containing DNA sequence
                                                                                                                                     376
                                                                                                                                                                     l Similarity
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                                                                                                                                GCCTCAGCCTCCCAAAG 392
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                                                                                                                                                                                     1.6%;
                                                                                                                                                                                                                                       10 C; 3 G; 2 T; 0 U; 0 Other;
                   BP.
                                                                                                     18
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                                                                                                                                                                                     Score 15.4;
Pred. No. 1
                                                                                                                                                                         Mismatches
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                                                                                                                                                                                     .7e+03;
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                                                                                                                                                                         Indels
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The invention relates to an isolated nucleic acid (I) involved in growth CC regulation in human colonic epithelial cells, termed CATX. (I) is useful CC as a probe/primer for detecting tumours, preferably colon cancer. The nucleic acid, encoded polypeptide and antibody are useful in diagnosis CC and treatment of abnormal cell growth (such as cervical cancer, and treatment of abnormal cell growth (such as cervical cancer, and cC lymphomas), in screening assays for the treatment of abnormal cell growth, for raising antibodies, and to screen for peptide analogues and CC growth, for raising antibodies, and to screen for peptide analogues and CC colon cancer cells, for generating probes and primers designed for CC colon cancer cells, for generating probes and primers designed for CC therapy, and in tissue profiling. (I) identifies cancer cells at an early cetterapy, and in tissue profiling. (I) identifies cancer cells at an early conditions prior to the total promability of the cancer cells can be identified prior CC conditions prior to spreading throughout the human body. (I) allows early detection CC conditions prior to spread of the cancer cells throughout the body, or CC prior to development of an irreversible cancerous condition. ABK27426-CC ABK27469 represent human colon cancer associated coding sequences and creatmers of the invention
                                                                                                                                                                                                                                     RESULT 1963
                                                                                                                                                                                                         ABS97649
                                                                                                                                                                                                                                                                                                                                                                                                                                         Best Local
Matches :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human; colon cancer; tumour; abnormal cell growth; melanoma;
cervical cancer; colorectal adenocarcinoma; Wilms' tumour; leukaemia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         09-APR-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Bowman BM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             09-AUG-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Colon cancer associated cDNA CATX-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ABK27429;
Human glutathione-S-transferase
                                                          23-DEC-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (FARB ) BAYER CORP.
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                                                                                                                                                                                                                                                                                                                                                                            644 CCAGGCTGGAGTGCAGT
                                                                                                                                                                                                                                                                                                                        18
                                                                                                                                                                                                                                                                                                                                                                                                                                         16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
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                                                             (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             3 G; 4 T; 0 U;
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0; Mismatches
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         12
         (GST12)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ..7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                            Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                               Gaps
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Cytochrome P450 A2; CYP4501A2; Cytochrome P450 02B; CYP45002B1; ITF;

(W adrenergic receptor beta1; ADBR1; aryl hydrocarbon; AHR; MRP3; NR112;

(W aryl hydrocarbon receptor nuclear translocator; ARNT; cathepsin S; CYPS;

(W cyclooxygenase 2; COX2; diazepam binding inhibitor; DBI; haematological;

(W cyclooxygenase 2; EPHX2; 5-11poxygenase activating protein; FLAP;

(W cyclooxygenase 2; EPHX2; 5-11poxygenase activating protein; FLAP;

(W cyclooxygenase 2; EPHX2; 5-11poxygenase activating protein; FLAP;

(W cyclooxygenase 2; CNZ2; nicotinamide-N-methyl transferase; NNMT;

(W lub-glicuronosyl transferase 2, MOO2; bulfotransferase; NNMT;

(W NADPH quinone oxidoreductase 2; NOO2; bulfotransferase thermolabile; STM;

(W UDP-glicuronosyl transferase 2B4; UDP-glicuronosyl transferase 2B7;

(W UGT2B7; UDP-glicuronosyl transferase; UGT2B15; urokinase receptor; uPA;

(W multidrug resistance associated protein 3; cancer; prostate;

(W acetylcholine muscarinic receptor; CHMR1; CHMR2; CHMR4; CHMR5;

(W altered drug metabolism; cardiovascular function; colorectal tumour;

(W central nervouse system: nilmonary)
              central nervous
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            primer; cytochrome P450 A1; CYP4501A1; UGT2B4; MDR1;
system; pulmonary; immunological.
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WO200257410-A2

28-NOV-2001; 2001WO-US044838.

28-NOV-2000; 2000US-00724389

(DNAS-) DNA SCI LAB INC

Isolated nucleic acid molecules having polymorphisms in known human genes e.g. cytochrome p450 and cathepsin S useful as genetic linkage markers for locating, identifying and characterizing the genes responsible for disorder-related traits.

12; Page 122; 714pp; English

CC molecule comprising at least one base variation from that of a known cytochrome P450 A1 (CYP4501A1), cytochrome P450 A2 (CYP4501A2), cytochrome P450 A2 (CYP4501A2), cytochrome P450 O2E1 (CYP45002E1), adrenergic receptor beta1 (ADBR1), CYTOCHROME P450 O2E1 (CYP45002E1), aryl hydrocarbon receptor nuclear translocator (ARWT), cathepsin S (CTSS), cyclooxgenase 2 (COX2), diazepam binding CYTOCHROME P450 O2E1, histamine.N-methyl CYTOCHROME P450 O2E1, waltidrug resistance 2 (NOCC), histamine.N-methyl CYTOCHROME P450 O2E1, histamine.N-methyl CYTOCHROME P450 O2E1,

immunological or haematological

in KLK2

ered pulmonary, for altered serine

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                                                       Best Loc
Matches
                                                                                     Query Match
                                                                                                                                             protease activity in the prostate, in LTF for altered immunological or haematological function, in CHMR3, CHMR4 or CHMR5 for altered central a peripheral nervous system function. The present sequence represents a primer used to amplify the sequences of the invention
                                                                                                                  Sequence 18 BP; 4 A; 5 C; 4 G; 5 T; 0 U; 0 Other;
                                                                        Local
                           935
_
                                                         16;
                                                                        Similarity
                           CTCTGTTACCCAGGCTG 951
CTATGTTACCCAGGCTG
                                                       Conservative
                                                                       94.1%;
                                                                                     1.6%;
17
                                                                        Pred. No.
                                                                                     Score 15.4;
                                                          Mismatches
                                                                     1.7e+03
                                                                                     DB 1; Length 18;
                                                          <u>.</u>
                                                       Gaps
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PCR
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RESULT 1964
ADG14613
ID ADG1461
XX ADG1461
XX ADG1461
XX Therape
XW Therape
XX The Inflamm
XX Therape
XX (UABR-)
XX WPI; 20
XX The Inflamm
CC Therape
CC T
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         IL-10 regulatory region; single nucleotide polymorphism; SNP; haplotype; genotype; cytotoxic T-lymphocyte antigen-4; CTLA-4 promoter; CTLA-4 exon 1; bacterial infection; meningococcal infection; rheumatoid arthritts; systemic lupus erythematosus; Sjogren's syndrome; inflammatory bowel disease; multiple sclerosis; human; PCR; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Therapeutic ribavirin; h
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADG14613;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    c response; therapeutic outcome; interferon-alpha-2b;
hepatitis C virus; HCV infection; interleukin-10;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                regulatory region PCR primer IL10-2763AR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
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27-FEB-2002; 2002WO-US006207.

27-FEB-2001; 2001US-0271811P

(UABR-) UAB RES

Ģ Kaslow ₽₽, Van Leeuwen 멏

WPI; 2002-707021/76

Predicting a therapeutic response comprises comparing a first nucleic acid allele in an interleukin-10 (IL-10) regulatory region with a seconderic acid allele in the IL-10 regulatory region associated with a outcome a second

Claim 12; SEQ ID NO 4; 34pp; English

therapeutic response to the administration of interferon-alpha-2b and ribavirin for the treatment of a pathological condition, especially chepatitis C virus (HCV) infection. The method involves determining which allelic form is present at positions -3575, -2763, -1082, -819 and -592 of the interleukin-10 (IL-10) regulatory region, and comparing these with the allelic forms at these positions which are associated with a known outcome of interferon-alpha-2b and ribavirin administration. Presence of the single nucleotide polymorphisms -592A and -819T, the -592A/A or -819T/T genotypes, the combination of -592A and -819T, the -592A/A or -600 (108)TCATA haplotype (encompassing positions -3575, -2763, -1082, -600 (108)TCATA haplotype (encompassing positions -3575, -2763, -1082, -600 (108)TCATC haplotype indicates that the presence of -592C and -819C, or the (108)TCACC haplotype indicates that the patient will be non-The invention relates to a method for predicting an individual's

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ABZ10660/c
IID ABZ106
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AC ABZ106
A
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            detection of the allele at position -318 of the cytotoxic T-lymphocyte antigen-4 (CTLA-4) promoter and the allele at position 49 of exon 1 of the CTLA-4 gene. The invention also encompasses kits and oligonucleotide primers for use in the methods of the invention. The method and primers are useful for identifying and analysing genetic polymorphisms in the IL-10 regulatory region and/or cytotoxic T-lymphocyte antigen-4 which can be used in predicting an individual's response to therapeutic intervention with interferon-alpha-2b and ribavirin for HCV infection, and for predicting the responsiveness of an individual to therapy for a pathological condition, or for predicting the outcome of therapeutic intervention in pathological conditions such as bacterial infection (e.g. meningococcal infection), rheumatoid arthritis, systemic lupus erythematosus, Sjogren's syndrome, inflammatory bowel disease or multiple sclerosis. The present sequence is related to the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; naemac,
gene therapy;
                          The present invention describes a method for detecting and differentiating between haematopoietic cell proliferative disorders associated with at least 1 gene and/or their regulatory regions in a subject. The method comprises contacting a target nucleic acid in a biological sample obtained from the subject with at least 1 reagent, which distinguishes between methylated and non-methylated CDG which distinguishes between methylated and non-methylated CDG.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Haematopoietic cell
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16-JAN-2003
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                                                                                                                                                                                                                                                                                 Detecting and differentiating between hematopoietic cell proliferative disorders, comprises contacting a target nucleic acid with a reagent tidistinguishes between methylated and non-methylated CpG dinucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytosine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Berlin K,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       26-MAR-2001; 2001US-0278333P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens.
                                                                                                                                                                                                                                  Claim
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (EPIG-)
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ч A,
ч e I,
                                                                                                                                                                                                                                                                                                                                                                                                   2003-018942/01.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1 Similarity
16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                haematopoietic cell proliferation disorder; cyto herapy; lymphocytic leukaemia; acute myelogenous ne methylation state; probe; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       N
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                , Braun A, Distler J, Piepenbrock C, Adorjan Lipscher E, Maier S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           CACCACGCCCGGCTTAT 901
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                                                                                                                                                                                                                                                                                                                                                                                                                                                        Lipscher E, |
, Ziebarth H;
                                                                                                                                                                                                                               Page 55;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 4 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                         117pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  proliferation disorder related oligonucleotide
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                                                                                                                                                                                                                               English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ВP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 15.4; DB 1; Pred. No. 1.7e+03;
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1 P, Grabs |
Model F, 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Howe A, M
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length 18;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mueller J;
he R, Leu E;
V, Otto T,
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dinucleotides

within the target nucleic acid. ABZ09861 to

ABZ11118

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RESULT 1966
ADM47300/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           CC represent specifically claimed nucleotide sequences from the present convention. Oligonucleotides from the present invention can be used: for CC disorder haematopoietic cells; for differentiating between healthy haematopoietic cells and proliferative CC disorder haematopoietic cells; for differentiating between acute CC lymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC determining the cytosine methylation state and/or single nucleotide CC polymorphisms (SNPS) of haematopoietic cell proliferation disorder CC related sequences and their complements; and as primers for the CC amplification of haematopoietic cell proliferation disorder related DNA CC sequences. The nucleotide sequences from the present invention can also CC be used for detecting a predisposition to, differentiation between CC collasses, diagnosis, prognosis, treatment and/or monitoring of CC haematopoietic cell proliferative disorders. The present method enables a highly specific classification of haematopoietic cell proliferative disorders allowing for improved and informed treatment of patients
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Matches
14-AUG-2001
17-SEP-2001
19-SEP-2001
21-SEP-2001
21-SEP-2001
25-SEP-2001
25-SEP-2001
09-CCT-2001
21-NOV-2001
21-NOV-2001
21-PEB-2002
22-PEB-2002
28-PEB-2002
01-MAR-2002
01-MAR-2002
12-MAR-2002
                                                                                                                                                                                                     17-JUL-2001;
24-JUL-2001;
27-JUL-2001;
30-JUL-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 18
                                                                                                                                                                                                                                                                                                    09-JUL-2001;
11-JUL-2001;
                                                                                                                                                                                                                                                                                                                               05-JUL-2001;
                                                                                                                                                                                                                                                                                                                                                          03-JUL-2002;
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                                                                                                                                                                                                                                                                                                                                                                                                                                         Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              NOVX; cytostatic; gene therapy; vaccine; cancer; chromosome mapping;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         NOVX oligonucleotide forward
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ADM47300;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ADM47300 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                WO2003083039-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AATCTCACTCTATTACC
                                                     2001US-0323821P.
2001US-0323948P.
2001US-0324711P.
2001US-0327893P.
2001US-0337893P.
2002US-035919P.
2002US-0358939P.
2002US-0360923P.
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               2002US-0360830P
2002US-0361178P
2002US-0361748P
                                                                                                                                                                2001US-0322640P.
2001US-0323484P.
                                                                                                                                                                                         2001US-0308228P.
2001US-0308877P.
2001US-0312203P.
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2001US-0305673P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                 2001US-0307536P
                                                                                                                                                                                                                                                                                        2001US-0305011P
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Pred. No. 1.7e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          primer,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        6 T;
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RESULT 1967
ADN02351
ID ADN0235
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AC ADN0235
XX
AC ADN0235
XX
DT 15-JUL-
XX
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                                                                                                                                                                                                                         S
                                                                                                                                                                                                                                                                                                                                        composition further comprises: a composition; a kit computed the composition, a method for determining the presence or amount of the presence of, or predisposition to, a disease associated with the altered commandian subject; identification to, a disease associated with the altered commandian subject; identification of an agent that binds to the polypeptide; identification of an agent that binds to the polypeptide; identification of a potential therapeutic agent for treating composition; or predisposition to, a pathology associated with the compositions of the polypeptide; a method of screening for a modulator of activity or compressing or predisposition to, a pathology associated with the polypeptide; a method for modulating the activity of the polypeptide; are treating a pathology associated with the polypeptide; treating a pathology associated with the polypeptide; comprising the vector; an antibody that immunospecifically binds to the polypeptide; and a method for producing the polypeptide. The NOVX polypeptide can be used in gene therapy to treat disorders. The conviction of preparing a composition for treating or preventing a pathological state in a mammal, e.g., cancer, or for chromosome mapping. This polynucleotide sequence represents a primer used in the
                                                                                                                                                                                                                                                                               Query Match
Best Local
                                                                                                                                                                                                                                                                 Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       12-MAR-2002;
12-APR-2002;
16-APR-2002;
16-APR-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Shimkets RA, Taupie
Padigaru M, Peyman
Pena CEA, Chapoval
                     15-JUL-2004
                                                         ADN02351;
                                                                                              ADN02351
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    the 109-1671 amino acid polypeptide; or a sequence comprising one or muconservative substitutions in the 109-1671 amino acid polypeptide. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New NOVX polypeptide, useful for preparing a composition preventing e.g. cancer or for chromosome mapping.
                                                                                                                                                                                                                                                                                                                                        Sequence 18
                                                                                                                                                                                                                                                                                                                                                                           exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention relates to a novel isolated polypeptide,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example C; SEQ ID NO 133; 433pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Catterton
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Li L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17-APR-2002;
19-APR-2002;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2003-812538/76.
                                                                                                                                                                                                                             535
                                                                                                                                                                                        17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       vention relates to a novel isolated polypeptide, designated NOVX.

vel polypeptide comprises a sequence comprising 109-1671 amino
or its mature form, a sequence that is at least 95% identical to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Shenoy SG, Pattura
ton E, Spytek KA,
ts RA, Taupier RJ,
                                                                                                                                                                                                                                                               l Similarity
16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CURAGEN
                                                                                                                                                                                                                             CTCCTGCCTCAGCCTCC 551
                                                                                              standard;
                                                                                                                                                                                        CTCCAGCCTCAGCCTCC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ; 2002US-0363683P.
2002US-0372141P.
2002US-0372967P.
; 2002US-0373051P.
; 2002US-0373063P.
; 2002US-0373287P.
; 2002US-0373881P.
; 2002US-0373881P.
                                                                                                                                                                                                                                                                                                                                      BP; 4 A;
                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2002US-00187975
                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Patturajan M, Ellerman K, Gorman L, ek KA, Miller CE, Edinger SR, Hjalt T, Citer RJ, Anderson DW, Guo X, Baumgartner an JA, Smithson G, Casman SJ, Voss EZ, B Kekuda R, Vernet CAM;
                                                                                              DNA;
                                                                                                                                                                                                                                                                                1.6%;
                                                                                                                                                                                                                                                                                                                                      2 C; 10 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                 0
                                                                                                                                                                                                                                                                                Score 15.4; DB 1;
Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                  DB 1; Length 18
                                                                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         for treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Zhong M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Boldog FL;
                                                                                                                                                                                                                                                                 <u>..</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gerlach VL;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             more
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RESULT 1968
ADNO6374/c
ID ADNO637
XX ADNO637
AC ADNO637
XX
DT 15-JUL-
XX
DE Human F
XX
DE Human F
XX
DE Hukotz
KW leukotz
KW leukotz
KW 1-1ipox
KW 5-Lipox
KW 5-Lo ge
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                                                                                                                                                                                                                                                                                                                                          5
                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                             abnormality is an indication that the patient has an increased risk of the late-onset neurodegenerative disease. DAO is a flavin dinuclectide (FAD)-dependent oxidase which catalyses the oxidative deamination of D-amino acids (EC.1.4.3.3). The method of the invention has neuroprotective and antiparkinsonian applications and may be useful in determining an increased risk of a late-onset neurodegenerative disease to a patient, as well as in preparing a medicament for treating a late-onset neurodegenerative disease (AD), possibly via gene therapy. The current sequence is that of a PCR primer 2 of the invention which was used to amplify human D-amino acid oxidase exon 1 gDNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                late-onset neurodegenerative disease; D-amino acid oxidase; DAO; Elavin dinucleotide; FAD-dependent oxidase; D-amino acid oxidative deamination; EC.1.4.3.3; neuroprotective; antiparkinsonian; amyotrophic lateral sclerosis; ALS; Parkinson' Alzheimer's; gene therapy; human; ss; PCR; primer; chromosome 12
              leukotriene biosynthesis inhibitor; leukotriene receptor antagonist; 5-lipoxygenase activating protein; FLAP; human; chromosome 13; chromosome 13q12; polymorphism; 5-lipoxygenase gene promoter;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Determining an increased risk of a late-onset neurodegenerative disease to a patient comprises analyzing a sample from the patient to determine whether the patient has a D-amino acid oxidase (DAO) abnormality.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2004-348204/32.
                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     analysing a sample from the patient to determine whether the patient a D-amino acid oxidase (DAO) abnormality, where the presence of a DAC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Example 1; SEQ ID NO 79; 209pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                09-OCT-2002; 2002GB-00023424.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               06-OCT-2003; 2003WO-GB004337
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WO2004033723-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       PCR
                                                                                                                                                                                         ADN06374;
                                                                                                                                                                                                                       ADN06374 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (IMCO-) IMPERIAL COLLEGE INNOVATIONS LTD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   22-APR-2004.
                                                                                                                                                        15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to a novel method for determining
                                                                                   leukotriene synthesis inhibitor; myocardial infarction;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       primer 2 used to
                                                                                                                                                                                                                                                                                                                                              877
                                                                 coronary
                                                                                                                      FLAP
                                                                                                                                                                                                                                                                                                                                                                             16;
                                                                                                                                                                                                                                                                                                              ۳
                                                                                                                                                                                                                                                                                                                                                                                               Similarity
                                                                                                                                                                                                                                                                                                              GCGTGAACCACCACGCC
                                                                                                                                                                                                                                                                                                                                              GCGTGAGCCACCACGCC
                                                                                                                      related microsatellite marker SEQ
                                                                                                                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                               BP; 4 A; 8 C; 4 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              De Belleroche
                                                                                                                                                        (first
                                                                 syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          neurodegenerative disease to a patient
                                                                                                                                                                                                                         DNA;
                                                                                                                                                      entry)
                                                                                                                                                                                                                                                                                                                                                                                             1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       amplify human D-amino acid oxidase exon 1 gDNA.
                                                                                                                                                                                                                           18
                                                                 antiatherosclerotic;
                                                                                                                                                                                                                                                                                                              17
                                                                                                                                                                                                                                                                                                                                               893
                                                                                                                                                                                                                                                                                                                                                                             <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                               Score 15.4; DB 1
Pred. No. 1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                 2 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                  0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                      ID NO:22.
                                                                      cardiant; antianginal;
                                                                                                                                                                                                                                                                                                                                                                                                                 Length
                                                                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        chromosome 12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Parkinson's;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          which comprises
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          an increased risk
                                                                                                                                                                                                                                                                                                                                                                               <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                               Gaps
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          has
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hypertension;

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The present invention describes using a leukotriene synthesis inhibitor (CC (I) for the manufacture of a medicament for the treatment of myocardial infarction or susceptibility to myocardial infarction in an individual. CC Also described is a method (MI) for the treatment of acute coronary CC syndrome (ACS) in an individual comprising administering (I). (I) has call the continuous continuous and antiatheroscierotic, cardiant and antianginal activities, and can be used as a leukotriene biosynthesis inhibitor, and a leukotriene receptor CC antagonist. (I) can be use for the manufacture of a medicament for the treatment of myocardial infarction or susceptibility to myocardial CC infarction in an individual who has at least one risk factor chosen from CC the 5-lipoxygenase activating protein (FLAP) gene, a polymorphism in a CC (LO) gene promoter; in an individual who has at least one risk factor chosen from diabetes, hypertension, hypercholesterolaemia, elevated cohosen from diabetes, hypertension, hypercholesterolaemia, elevated
                                                                                                                                                                                                                                                                                                                      Consern from clastic, hypercularly, hypercularity contains, covered conserning observations, besity, past or current smoker; in an individual having elevated confilammatory marker chosen from C-reactive protein (CRP), serum amyloid CC A, fibrinogen, leukotriene, leukotriene metabolite, interleukin-6, tissue nerosis factor-alpha, soluble vascular cell adhesion molecule (sVCAM), consist factor-alpha, soluble vascular cell adhesion molecule (sVCAM), contains the contains 
                                                     Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Use of leukotriene synthesis inhibitor for manufacture of a medicament for treatment for myocardial infarction or susceptibility to myocardial infarction in individual.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 obesity; inflammatory marker; low density lipoprotein; cholesterol; high density lipoprotein; angina; atherosclerosis; microsatellite marker;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17-OCT-2002; 2002US-0419433P
21-FEB-2003; 2003US-0449331P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29-APR-2004.
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                                                                                                                                                                             Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Disclosure; SEQ ID NO 22; 306pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2004-357211/33.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Helgadottir A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     16-OCT-2003; 2003WO-US032556
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (DECO-) DECODE GENETICS EHF
                                                                                                                                                                             BP; 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gurney ME,
                                                                                                                                                                             Α.
1.6%;
                                                                                                                                                                             7 C; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Gulcher JR
                                                                                                                                                                             G; 5 T; 0 U; 0 Other;
     Score 15.4;
Pred. No. 1
                                                                 DB 1;
                                                           Length 18;
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17

CCCAGGCTGGAGTGCAA 959 CCCAGGCTGGAGAGCAA 1

Matches

Similarity

Conservative

<u>.</u>

1.7e+03

Indels

0;

Gaps

0

Matches Query Match

16;

Conservative

0;

Mismatches

٥,

Gaps

0

Similarity

1.6%;

Score 15.4; DB 1 Pred. No. 1.7e+03

Length Indels

18

BP;

4 A;

6 C; 4 G; 4 T;

0 U,

0 Other; DB 1;

482 GCAGTGGTGTGATCACA 498

밁 S

18

GCAGTGGTGTGATCCCA

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RESULT 1969
AD043261/c
ID AD04326
XX AD04326
XX AD04326
XX Bipolar
XX Homo sa
XX CUCLB-)
PA (EWAL/)
XX Ewald F
PI Kruse 1
XX WPI; 20
XX WPI; 20
XX The pre
CC D12sDKI
CC Alleles
CC Alleles
CC T12 (CLI
CC Alleles
CC Alleles
CC T12 (CLI
CC T
                                                                                       The present sequence is that of primer D12SDK1F which, with primer CC D12SDK1R AD043262, can be used to amplify D12SDK1, a novel microsatellite CC marker associated with bipolar affective disorder and genetically related CC unipolar affective disorder. D12SDK1 comprises a dinucleotide repeat. 8 CC Alleles (134-152 bp) have been detected. A locus for bipolar disorder and CC related unipolar affective disorders has been fine mapped on chromosome C1 (C12) for the first time and several genes that are carrying mutations increasing susceptibility to bipolar disorder have been identified. The C2 region is approximately 2 million base pairs of DNA in the chromosomal CC region 12g24.3 on the short arm of chromosome 12 between markers D1282705 CC and D12S340. The inventors genotyped 21 newly described and previously published microsatellite markers in a sample of 381 Danish and British CC bipolar patients and compared the frequency of marker alleles to a compared the regults, the invention provides marker alleles to a based on the results, the invention provides markers and methods of using them in diagnosing, or determining the susceptibility of an individual to, bipolar and genetically related unipolar affective disorders and creatment compounds for use as part of therapeutic and/or diagnostic methods. A method of treatment comprises administering a substance that modulates candardate gene or which modulates the level of activity of a candidate gene or which modulates the level of activity
                                                                    method of treatment comprises a expression of a candidate gene of a candidate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Diagnosing, prognosing, or determining the susceptibility to, a neuropsychiatric disorder using a C12 candidate gene region marker by determining the structure, level of expression or activity of a polypeptide encoded by the gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Bipolar affective disorder; Unipolar affective disorder; diagnosis; marker; neuroleptic; gene therapy; PCR; primer; human; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADO43261 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              31-OCT-2002; 2002GB-00025360
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           31-OCT-2003; 2003WO-GB004684
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Bipolar and unipolar affective disorder marker D12SDK1 primer D12SDK1f.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Claim 19; Page 79; 96pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2004-376206/35
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (UCLB-) UCL BIOMEDICA. (EWAL/) EWALD M V.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WO2004040016-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Kalsi G, M
Lundorf MD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mcquillin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ВР
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ۶,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gurling HMD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Degn
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mors
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RESULT 1971
ADO48745
ID ADO4874
XX
AC ADO4874
XX
DT 12-AUG-
DT 12-AUG-
XX
Human n
XX
Human;
KW human;
KW human;
KW mannose
XX
OS Homo se
XX
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RESULT 1970
ADO48762
                                                                                                                                                                                                                                                                                                                                                     8
                                                                                                                                                                                                                                           밁
                                                                                                                                                                                                                                                                                            Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                          The invention comprises a method for identifying a subject at risk of melanoma. The invention involves detecting the presence or absence of one or more polymorphic variations associated with melanoma in the neuropilin 1 (NRP1) or mannose receptor C type 2 (MRP2) genes. The method of the invention is useful for identifying subjects at risk and treating melanoma. The present DNA sequence represents an extension PCR primer that was used to detect single nucleotide polymorphisms within human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Roth
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          human; melanoma; single nucleotide polymorphism; SNP; neuropilin 1; NRP1; mannose receptor C type 2; MRC2; extension PCR; primer; ss; genotyping.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADO48762 standard;
                                                                                                                                                                                                                                                                                                                                                   Sequence 18 BP; 4 A; 3 C; 6 G; 4 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADO48762;
                 Homo sapiens
                                        mannose receptor
                                         human; melanoma; single nucleotide polymorphism; SNP; neuropilin 1; NRP1; mannose receptor C type 2; MRC2; extension PCR; primer; ss; genotyping.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Example 3; Page 79; 176pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2004-411720/38.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       06-NOV-2002; 2002US-0424475P
23-JUL-2003; 2003US-0489703P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            27-MAY-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO200404163-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human neuropilin 1 (NRP1) extension PCR primer
                                                                                  Human neuropilin 1
                                                                                                               12-AUG-2004
                                                                                                                                          AD048745
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               06-NOV-2003; 2003WO-US035876
                                                                                                                                                                    ADO48745 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (SEQU-) SEQUENOM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                sapiens
                                                                                                                                                                                                                                                        392 GTGCTGGGATTACAGGC 408
                                                                                                                                                                                                                                          μ
                                                                                                                                                                                                                                                                                               16;
                                                                                                                                                                                                                                                                                                              Similarity
                                                                                                                                                                                                                                        GTACTGGGATTACAGGC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Nelson MR,
                                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first entry)
                                                                                                             (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA;
                                                                                                                                                                    DNA;
                                                                                   (NRP1) extension PCR primer #47.
                                                                                                             entry)
                                                                                                                                                                                                                                                                                                           1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Braun
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                                                                                                                                                                                                                                                                                                            Score 15.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                               Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Kammerer
                                                                                                                                                                                                                                                                                                            1.7e+03;
                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                      Length 18;
                                                                                                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                                                                              0
                                                                                                                                                                                                                                                                                               Gaps
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ADO56946/c
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention comprises a method for identifying a subject at risk of melanoma. The invention involves detecting the presence or absence of one or more polymorphic variations associated with melanoma in the neuropilin 1 (NRP1) or mannose receptor C type 2 (MRC2) genes. The method of the invention is useful for identifying subjects at risk and treating melanoma. The present DNA sequence represents an extension PCR primer that was used to detect single nucleotide polymorphisms within human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               06-NOV-2002;
23-JUL-2003;
                                                                                                                                                                                                 melanoma associated polymorphic variation; SNP;
single nucleotide polymorphism; CARK; FPGT;
cardiac ankyrin repeat kinase; fucose-1-phosphate guanylyltransferase;
                                                                                                                                                                                                                                                            Human CARK/FPGT proximal SNP probe #12
                                                                                                                                                                                                                                                                                                             AD056946;
                                                                                                                                                                                                                                                                                                                                  AD056946
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example 3; Page 78; 176pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Roth RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  06-NOV-2003; 2003WO-US035876
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WO200404163-A2
           Roth RB,
                                                       06-NOV-2002;
23-JUL-2003;
                                                                                           06-NOV-2003; 2003WO-US035879
                                                                                                                                          WO2004044164-A2
                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                       gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  NRP1.
                                                                                                                    27-MAY-2004.
                                                                                                                                                                                                                                                                                     12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (SEQU-)
                                 (SEQU-) SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                      392
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                                                                                                                                                                                                                                                                                                                                                                                                                                            16;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          18 BP; 4 A; 3 C; 6 G; 4 T; 0
                                                                                                                                                                                                                                                                                                                                    standard;
                                                                                                                                                                                                                                                                                                                                                                                              GTGCTAGGATTACAGGC 17
                                                                                                                                                                                                                                                                                                                                                                                                                      GTGCTGGGATTACAGGC 408
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Nelson MR,
           Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2002US-0424475P.
2003US-0489703P.
                                                       2002US-0424475P.
2003US-0489703P.
                                                                                                                                                                                                                                                                                   (first entry)
                                                                                                                                                                                                                                       human;
                                                                                                                                                                                                                                                                                                                                   DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.6%;
                                                                                                                                                                                                                                       ss; melanoma;
           Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                            0
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Kammerer
            Kammerer SM;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NS.
                                                                                                                                                                                                                                                                                                                                                                                                                                                       .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 18,
                                                                                                                                                                                                                                                                                                                                                                                                                                              Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                              Gaps
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2004-411721/38

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AD056480
XX
AC AD05
XX
AC AD05
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AC AD05
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BOR Huma
XX
BOR Huma
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          RESULT 1973
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject comprises detecting the melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cardiac ankyrin repeat kinase/fucose-1-phosphate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADO56480 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    guanylyltransferase, CARK/FPGT, proximal probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention relates to a method of identifying a subject at risk of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          variations
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human cyclin-dependent kinase 10,
                                                                                                                                     Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                          06-NOV-2002;
23-JUL-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          06-NOV-2003; 2003WO-US035879
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              single nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              melanoma
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    gene therapy;
                                                                                                                                                                                                                                                 WPI; 2004-411721/38.
                                                                                                                                                                                                                                                                                                                                                       (SEQU-)
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16; Conserv
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                                                                                                                                                                                                                                                                                                                                                       SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              associated
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                                                                                                                                                                                                                                                                                                 Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       g a subject at risk of melanoma, useful for treating melanoma, detecting the presence or absence of one or more polymorphic associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Page 120;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 5 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                                          2002US-0424475P
2003US-0489703P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    human; ss; melanoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            polymorphism; cyclin-dependent kinase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              polymorphic variation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    4 C; 7 G; 1 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           295pp; English.
                                                                                                                                                                                                                                                                                                    Braun
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Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                    Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CDK10 proximal SNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    4; DB 1;
1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              SNP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             probe
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The invention Example 5;

relates to

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method of identifying a subject at risk

The invention relates to a method of identifying a subject at risk of melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and

mple the with

Page 83; 295pp;

English

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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid samp from a subject. Preventing melanoma in a subject comprises detecting t presence or absence of one or more polymorphic variations associated w melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cyclin-dependent kinase 10, CDK10, proximal SNP pro
                                                                                                                                                                                                                                                                                                                                                                                                                                                             melanoma associated polymorphic variation; SNP; single nucleotide polymorphism; CARK; FPGT; cardiac ankyrin repeat kinase; fucose-1-phospha
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       gene therapy; human;
                                                                                                                                     Example 7; Page 121; 295pp; English.
                                                                                                                                                                          Identifying a subject at risk of melanoma, useful for treating melanoma comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                              WPI; 2004-411721/38.
                                                                                                                                                                                                                                                       Roth
                                                                                                                                                                                                                                                                                                         06-NOV-2002;
23-JUL-2003;
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                                                                                                                                                                                                                                                                                                                                                                        27-MAY-2004.
                                                                                                                                                                                                                                                                                                                                                                                                  WO2004044164-A2
                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                    probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AD057017
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AD057017
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                duman CARK/FPGT
                                                                                                                                                                                                                                                                                 (SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      249 TCGGCCTCCCAAAGTGC 265
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            16; Conserv
                                                                                                                                                                                                                                                                                 SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               18 BP; 4 A; 7 C; 4
                                                                                                                                                                                                                                                       Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                          2002US-0424475P
2003US-0489703P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               proximal SNP probe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ss; melanoma;
                                                                                                                                                                                                                                                         Braun
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 15.4; D
Pred. No. 1.7e
0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                   fucose-1-phosphate guanylyltransferase,
                                                                                                                                                                                                                                                          Kammerer
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1 Other,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            .7e+03
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RESULT 1975
ADP08750
ID ADP0875
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Best Local S
Matches 16
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Best Local Similarity
Matches 16; Conserv
                                                                                                                                                             The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single neutropolymorphisms within human glycoprotein VI (platelet) (GP6;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             compositions are useful for treating melanoma. The present sequence represents a human cardiac ankyrin repeat kinase/fucose-1-phosphate guanylyltransferase, CARK/FPGT, proximal probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  breast cancer; cytostatic; gene therapy; human; platelet glycoprotein VI; GP6; GPIV; GPVI; chromosome 19q13.4; ss; PCR; primer; SNP; single nucleotide polymorphism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 18
                                                                                                                      Sequence 18
                                                                                                                                                                                                                                                                                                                                                            Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for
                                                                                                                                                    GPIV;GPVI)
                                                                                                                                                                                                                                                                                                                  Example 3; Page 83; 286pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                          Roth
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   25-NOV-2002; 2002US-0429136P.
24-JUL-2003; 2003US-0490234P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO2004047767-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADP08750 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (SEQU-) SEQUENOM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-NOV-2003; 2003WO-US037966.
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N
                                                                           Similarity
                               CAGGCTGGTCTCGAACT 223
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CTTGTGATCTGCCTGCC 848
 CAGGCTGGACTCGAACT 18
                                                                                                                                                                                                                                                                                                                                                                                                                                         Nelson MR,
                                                                                                                                                 DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 5 A; 4 C; 7 G; 1 T; 0 U; 1 Other;
                                                                                                                      BP; 4 A;
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                                                            Conservative
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                                                                       1.6%;
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                                                                                                                     6 C; 5 G; 3 T; 0 U; 0 Other;
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Pred. No. 1
                                                                         Score 15.4; DB 1;
Pred. No. 1.7e+03;
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                                                            Mismatches
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                                                                                       DB 1; Length 18;
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                                                            Indels
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                                                           Gaps
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RESULT 1977 AAH39033/c

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AAH39033 standard;

DNA; 19

RXAXAX

14-AUG-2001 AAH39033;

(first entry)

SNP specific upper PCR primer SEQ ID 1829.

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Matches

Conservative

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427 16;

TTTTTATTTTATTTTTT 443 TTTTTATTTTTTTT 18

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RESULT 1976
ADQ78196
ID ADQ7819
XX
AC ADQ7819
XX
OT 09-SEP-
XX
                                                                     This invention relates to a novel mini-sequencing type DNA oligonucleotide chip. Specifically, it refers to a chip that is useful for detecting methylation of promoter CpG islands occurring in multiple genes. The present invention describes using oligonucleotide primers to determine the position of a target gene and promoter CpG islands, this constitutes treating DNA of the target gene with sodium bisulfite in order to carry out methylation specific (MSP) PCR or multiplex MSP PCR to amplify the sodium bisulfite treated DNA and sequencing the PCR product to confirm the hypomethylation site of the promoter CpG islands of multiple genes. Accordingly, the chip comprises primer sequences designed from these PCR products that have amine linkers of 12 carbons attached to the 5'-terminal, which are spotted onto the glass slide coated with 3-dminopropyltrimethoxylan and 1.4-dissothiocyanate using an array robot. The resulting minisequencing chip is useful for detecting cancer, thereby accurately and rapidly detecting methylation of CpG islands of multiple genes whis oligonumless as a PCR primer given in an
               Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Minisequencing type oligonucleotide chip for detecting methylation of promoter CpG islands of multiple genes, useful for detecting cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    mini-sequencing; CpG island; methylation specific PCR; MSP; multiplex MSP PCR; cancer; PCR; primer; ss; microarray chip
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                                                                   Sequence 18 BP; 1 A; 0 C; 1 G; 16 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 13; SEQ ID NO 878; 248pp; Korean.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2004-095256/10
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Choi HI,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         20-FEB-2002; 2002KR-00009132
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          07-MAY-2002; 2002KR-00025108
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         PCR primer used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADQ78196;
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                                                                                                       exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (GOOD-)
                                                                                                                          This oligonucleotide sequence is a PCR primer given in an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       GOODGENE INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Eom TH,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         amplify cancer related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cancer; PCR; primer; ss; microarray chip
               1.6%;
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                Score 15.4;
Pred. No. 1.
Mismatches
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                1.7e+03;
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                                   DB 1;
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                                 Length 18;
Indels
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NO:

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RESULT 1978
AAF91124/C
ID AAF9112
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AC AAF9112
XX
DT 04-MAY-
XX
                                                                                                                                                                                                                                                                                                                                             Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide CC primer extension (SNPB) primers, and the sequences of regions flanking CC sites of single nucleotide polymorphisms SNPs. The present invention CC includes kits for determining the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPB primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by CC performing a single-nucleotide primer extension reaction. The CC oligonucleotides are useful for determining the presence, absence or CC identity of a SNP and for genotyping nucleic acid samples for e.g. to CC assess by association analysis the genotype of an individual or group of CC assess by association analysis the genotype of an individual or group of CC caused by one or more SNPs. Phenotypic trait suspected of being CC agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CC osteogenesis imperfecta and acute intermittent porphyria. Phenotypic traits also include symptoms of or susceptibility to multifactorial CC disease of which a component is or may be genetic such as autoimmune confider, rheumatoid arthritis, multiple sclerosis, infection by nathocenic infection by nathocenic confiders, nervous system diseases and infection by nathocenic confiders, rheumatoid arthritis, multiple sclerosis.
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                                                                                                                                                                                                                                                                  Query Match
Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Single nucleotide polymorphism; SNP; single nucleotide primer extension; SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholasterolaemia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                   microorganism. The method is also useful in forensic invespaternity analysis. The present sequence represents a PCR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 1; Page 59; 83pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15-OCT-1999;
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                       04-MAY-2001
                                                                                                                                                                                                                                                                                                                                             Sequence
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                                                           AAF91124;
                                                                                                                                                                                                                                                                                                                                                                                                                        inflammation, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and
                                                                                                                                                                                                                                                                                                                                                                                   a human
                                                                                                                                                                                                                               648
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                                                                                                standard;
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                       (first
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                          Length
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RESULT 1979
AAF91126
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New polynucleotide encoding a molecular variant Multi Drug Resistance (MDR)-1 polypeptide is useful for diagnosing and treating diseases associated with abnormal MDR-1 expression or function, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human multi drug resistance-1 gene related sequence SEQ
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22-FEB-2000; 2000EP-00103361.
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                                   30-JUL-1999;
22-FEB-2000;
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(EPID-) EPIDAUROS BIOTECHNOLOGIE
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The present invention describes the use of irinotecan (I) or its derivative for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a varia allele which comprises a cytochrome p450, subfamily IIIA (nifedipine oxidase), polypoptide 5 (CYP3A5) polymoclectide (II). (I) and (II) have cytostatic activity. The therapeutic applications of (I) is improved,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention provides nucleotides encoding molecular vari the human multi drug resistance-1 (MDR-1) protein. These can be us identify compounds capable of treating multidrug resistance and sensitivity interfering resulting from polymorphisms in MDR-1, whi lead to difficulties in treating cancer, cardiovascular, neuronal,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New polynucleotide encoding a molecular variant Multi Drug Resistance (MDR)-1 polypeptide is useful for diagnosing and treating diseases associated with abnormal MDR-1 expression or function, e.g. cancer.
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                                                                                                                               New use of irinotecan for preparation of compositions for treating in subject having genome with variant allele comprising cytochrome subfamily IIIA, polypeptide 5 polynucleotide, termed CYP3A5.
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24-MAY-2002; 2002EP-00011710
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      CC derivative for the preparation of a pharmaceutical composition for the treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant cliek which comprises a cytochrome p450, subfamily IIIA (nifedipine coxidase), polypeptide 5 (CYP3A5) polynucleotide (II). (I) and (II) have cytochrome p450, subfamily IIIA (nifedipine coxidase), polypeptide 5 (CYP3A5) polynucleotide (II). (I) and (II) have cytochrome p450, subfamily IIIA (nifedipine coxidase) polypeptide for composition of (I) is improved, composite activity. The therapeutic applications of (I) is improved, composite to individually treat a subject with an appropriate composition of the present invention sequences used in the composition of the present invention
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24-MAY-2002;
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                                                                                                                                                                                                                                                          The present invention describes a method for the use of irinotecan (I) or its derivative for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprises a multidrug resistance protein 1 (MRP1) polynucleotide (II). (I) has cytostatic activity. (I) or its derivative can be used for the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject, where the subject is a human (preferably African or Asian) or a mouse. The present sequence represent a sequence which is used in the exemplification of the present inventior
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lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
variant allele; multidrug resistance protein 1; MRP1; cytostatic; gene;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Use of irinotecan or its derivative for preparation of a pharmaceutical composition for treating cancer in a subject having a genome with a variant allele comprising a multidrug resistance protein 1
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24-MAY-2002;
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                                                                                                                                                                                                           Sequence
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                                                                                                                                                                                                           19 BP; 4 A;
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2002EP-00011710.
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                                                                                                                                                                                                           4 C; 9 G; 1 T; 0 U; 1 Other;
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Pred. No. 1
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Pred. No. 1.
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lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
variant allele; multidrug resistance protein 1; MRP1; cytostatic;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Use of irinotecan or its derivative for preparation of a pharmaceutical composition for treating cancer in a subject having a genome with a variant allele comprising a multidrug resistance protein 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject, where the subject is a human (preferably African or Asian) or a mouse. The present sequence represents a sequence which is used in the exemplification of the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   allele which comprises a multidrug resistance protein 1 (MRP1) polynucleotide (II). (I) has cytostatic activity. (I) or its derivative polynucleotide the preparation of a paramaceutical composition for the preparation of a protein composition of the preparation of the preparat
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24-MAY-2002;
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                                                      Human UGT1A1
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                                                                                                                                                               ADB88454;
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2002EP-00011710.
                                                   variant allele sequence fragment SEQ ID NO:523
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Pred. No. 1.7e+03;
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ss; irinotecan; cancer; UGT1A1; cytostatic; topoisomerase I inhibitor;

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uridine
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  colorectal cancer; cervical cancer; gastric cancer; lung cancer; ovarian cancer; pancreatic cancer; malignant glioma; uridine diphosphate glycosyltransferasel member Al.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               has cytostatic activity. A composition of the invention acts as a topoisomerase I inhibitor. The method is useful for treating a patient, an animal e.g. mouse or a human preferably African or Asian, suffering from cancer such as colorectal, cervical, gastric cancer, lung, ovarian, pancreatic cancer or malignant glioma. The present sequence is udes in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to the novel use of irinotecan to treat a patient suffering from cancer. This involves determining if the patient has one or more variant alleles of the UGTIA1 gene, and if the patient has one or more of such variant alleles, irinotecan is administered in an increased or decreased amount in comparison to the amount that is administered without regard to the patient's alleles in the UGTIA1 gene. The invention
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24-MAY-2002; 2002EP-00011710
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23-JUL-2002; 2002WO-EP008217.
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                                                               WO2003013536-A2
                                                                                             Homo sapiens
                                                                                                                                                            colorectal cancer;
                                                                                                                                                                          ss; irinotecan; cancer; UGT1A1; cytostatic; topoisomerase I inhibitor;
                                                                                                                                                                                                         Human UGTIA1 variant allele sequence fragment SEQ ID NO:524
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                                                                                                                         tal cancer; cervical cancer; gastric cancer; lung cancer; cancer; pancreatic cancer; malignant glioma; diphosphate glycosyltransferasel member Al.
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                                                                                                                                                                                                                                                                                                         standard;
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                        irinotecan; colorectal cancer; cervical cancer; q
lung cancer; ovarian cancer; pancreatic cancer; n
nullidrug resistance 1; MDR1; cytostatic; human;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      of irinotecan based on increased/decreased
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24-MAY-2002;
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24-MAY-2002; 2002EP-00011710
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                                 WPI; 2003-268145/26
                                                                   Heinrich G,
                                                                                                                                                                                       23-JUL-2002; 2002WO-EP008218.
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                                                                                                                                                                                                                                                                                            Homo sapiens
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2002EP-00011710
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1; Mismatches
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malignant glioma;
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New use of irinotecan for preparation of pharmaceutical compositions

for

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RESULT 1987
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The invention relates to the novel use of irinotecan or its derivative for the preparation of pharmaceutical compositions for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprises a multidrug resistance 1 (MDR1) polynucleotide. A composition of the invention has cytostatic activity. The invention is useful for the preparation of pharmaceutical compositions for treating colorectal,
                                                                                                                                                                                                                                                                                                                                                                                                      New use of irinotecan for preparation of treating cancer in subject having genome multidrug resistance 1 polynucleotide.
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24-MAY-2002;
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                                                                                                                                                                                                                                          the preparation of a pharmaceutical composition for treating colorectal, cervical, gastric, lung, ovarian or pancreatic cancer, or malignant glioma in a subject having a genome with a variant allele which comprise a multidrug resistance 1 (MDR1) polynucleotide. A composition of the invention has cytostatic activity. The present sequence is used in the
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multidrug resistance
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24-MAY-2002;
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                                                                                                                                                                               Sequence 19
                                                                                                                                                                                                                              exemplification of
                                                                                                                                                                                                                                                                                                                                                                                                                  Disclosure; Page 55; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Heinrich
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             23-JUL-2002; 2002WO-EP008220
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                irinotecan; colorectal cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (EPID-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Local
                                                                                                             Local
                                                                                                                                                                                                                                                                                                                                                                      invention relates ro a novel use of irinotecan or its derivative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                2003-342400/32.
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                                           832
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                                                                                       l Similarity
16; Conserv
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                                                CTTGTGATCTGCCTGCCTC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 BP; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                  BP; 1 A; 9 C; 4 G; 4 T; 0 U;
                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Kerb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2001EP-00117608
2002EP-00011710
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                                                                                                                                                                                                                                the
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.6%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 4 C; 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               al cancer; cervical cancer; gastric cancer;
cancer; pancreatic cancer; malignant glioma;
1; MDR1; cytostatic; ds; human; UGT1A1; MRP1; TOP1.
                                                                                                             1.6%;
                                                                                                                                                                                                                                   invention.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 15.4; D
pred. No. 1.7e
1; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   <u>ი</u>
                                                                                          1;
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                                           850
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  19
                                                                                                                Score 15.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1 T;
                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            15.4; DB 1;
No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0 U;
                                                                                                                .7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1 Other;
                                                                                                                                                                                    1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           pharmaceutical compositions with variant allele comprisi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length
                                                                                                                                      Length
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                                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0,
                                                                                               0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              sitions for comprising
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 of the
                                                                                               Gaps
                                                                                                                                                                                                                                                                                                         comprises
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Asian)
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RESULT 1989

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ID ADB92628 standard; DNA; 19
                                                                                                                                                                                                                                         RESULT 1990
                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                     cervical,
glioma in
a multidru
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          irinotecan; colorectal cancer; cervical cancer; gastric cancer;
lung cancer; ovarian cancer; pancreatic cancer; malignant glioma;
multidrug resistance 1; MDR1; cytostatic; ds; human; UGT1A1; MRP1; TOP1.
Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New use of irinotecan for preparation of pharmaceutical compositions treating cancer in subject having genome with variant allele comprisi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       23-JUL-2001; 2001EP-00117608
24-MAY-2002; 2002EP-00011710
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADB92628;
                                                    flavin dinucleotide; FAD-dependent oxidase;
D-amino acid oxidative deamination; EC.1.4.3.3; neuroprotective;
antiparkinsonian; amyotrophic lateral sclerosis; ALS; Parkinson'
                                                                                                                        PCR primer 2 used to amplify human thioredoxin reductase exon
                                                                                                                                                                                                            ADN02393 standard;
                                                                                                                                                                                                                                                                                                                                                                                             Sequence 19
                                                                                                                                                                                                                                                                                                                                                                                                                         exemplification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 55; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 multidrug
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Heinrich G,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 23-JUL-2002; 2002WO-EP008220
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              20-FEB-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human MDR1 variant allele sequence fragment SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                04-DEC-2003
                                        Alzheimer's;
                                                                                             late-onset neurodegenerative disease; D-amino acid oxidase;
                                                                                                                                                      15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates ro a novel use of irinotecan or its derivative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (EPID-) EPIDAUROS BIOTECHNOLOGIE AG
                                                                                                                                                                                                                                                                                                                                                                                                                                  he preparation of a pharmaceutical composition for treating colorectal, ervical, gastric, lung, ovarian or pancreatic cancer, or malignant lioma in a subject having a genome with a variant allele which comprise multidrug resistance 1 (MDR1) polynucleotide. A composition of the nvention has cytostatic activity. The present sequence is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        2003-342400/32.
                                                                                                                                                                                                                                                                                                          832 CTTGTGATCTGCCTGCCTC 850
                                                                                                                                                                                                                                                                                  19
                                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                CTCGTGATCYGCCCGCCTC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               resistance 1 polynucleotide.
                                                                                                                                                                                                                                                                                                                                                                                            BP; 4 A; 4 C; 9 G; 1 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                       Conservative
                           gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Kerb
                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                        of the invention.
                                     therapy;
                                                                                                                                                                                                                                                                                                                                                   1.6%;
                                                                                                                                                                                                             DNA;
                                                                                                                                                                                                             19
                                                                                                                                                                                                             ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP.
                                     human; ss; PCR; primer; thioredoxin reductase;
                                                                                                                                                                                                                                                                                                                                      ۲,
                                                                                                                                                                                                                                                                                                                                      Score 15.4; DB 1; Length 19; Pred. No. 1.7e+03; Indels 1; Mismatches 2; Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ID NO:523
                                                     Parkinson's;
                                                                                              DAO;
                                                                                                                                                                                                                                                                                                                                       0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              comprising
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  comprises
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         for
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                                                                         Matches
                                                                                         Query Match
Best Local Similarity
                                                                                                                                                                                                                                                            abnormality is an indication that the patient has an increased risk of the late-onset neurodegenerative disease. DAO is a flavin dinucleotide (FAD)-dependent oxidase which catalyses the oxidative deamination of D-amino acids (EC.1.4.3.3). The method of the invention has neuroprotective and antiparkinsonian applications and may be useful in determining an increased risk of a late-onset neurodegenerative disease to a patient, as well as in preparing a medicament for treating a late-onset neurodegenerative disease, such as amyotrophic lateral sclerosis (ALS), neurodegenerative disease, such as amyotrophic lateral sclerosis (ALS),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Determining an increased risk of a late-onset neurodegenerative disease to a patient comprises analyzing a sample from the patient to determine whether the patient has a D-amino acid oxidase (DAO) abnormality.
                                                                                                                                                   Sequence
                                                                                                                                                                                                      Parkinson's disease (PD) or Alzheimer's disease (AD), possibly therapy. The current sequence is that of a PCR primer 2 of the which was used to amplify human thioredoxin reductase (TXNRD1)
                                                                                                                                                                                                                                                                                                                                                                                                                   of a late-onset neurodegenerative disease to a patient which comprises analysing a sample from the patient to determine whether the patient has a D-amino acid oxidase (DAO) abnormality, where the presence of a DAO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2004-348204/32.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mitchell J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 09-OCT-2002; 2002GB-00023424.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       06-OCT-2003; 2003WO-GB004337
                                                                                                                                                                                        gdna.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Example 2; SEQ ID NO 121; 209pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WO2004033723-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to a novel method for determining an increased risk
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (IMCO-)
                                     829
                                                                         16;
 w
                                                                                                                                                   19
                                   GACCTTGTGATCTGCCT 845
GACCIGGIGATCIGCCT 19
                                                                         Conservative
                                                                                                                                                   BP; 2 A; 6 C; 5 G; 6 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        De Belleroche J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             COLLEGE INNOVATIONS LTD
                                                                                         1.6%;
                                                                       <u>.</u>
                                                                                         Score 15.4; DB 1;
Pred. No. 1.7e+03;
                                                                           Mismatches
                                                                                                               DB 1;
                                                                                                             Length 19;
                                                                         Indels
                                                                         <u>,</u>
                                                                                                                                                                                                                            invention
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30-NOV-1999; 99US-0168138P 29-NOV-2000; 2000US-00726173 30-NOV-2000; 2000WO-US032758 Human; single nucleotide polymorphism; SNP; genorptoein therapy; vaccine; probe; diagnostic assognantitation; restorative therapy; polymorphic; Human silent SNP containing nucleic acid SEQ:5328 09-NOV-2001 AAI78387; AAI78387 standard; HOMO (first entry) 99US-0168138P DNA; 51 genome; g

detection; gene therapy;

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RESULT 1992
ADO56498/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CC therapy, and in vaccine production. (I) and the polymeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases CC associated with inappropriate expression of polymorphic polypeptides. For CC example, (I) may be used to treat disorders by rectifying mutations or CC example, (I) may be used to treat disorders by rectifying mutations or CC example, (I) may be used to treat disorders by rectifying mutations or CC production of polypeptide. Additionally, (I) and its complementary CC sequences may also be used as DNA probes in diagnostic assays to detect CC and quantitate the presence of similar nucleic acids in samples, and CC polypeptides encoded by (I) may be used as antigens in the production of CC polypeptides encoded by (I) may be used as antigens in the production of CC be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic CC be used as diagnostic agents for detecting the presence of polymorphic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAI73060 to AAI79867 represent isolated human polymorphic polymucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs).

AAM53114 to AAM5329 represent peptides related to human polymorphic polymucleotide sequences. The sequences can be used in gene and protein polymucleotide sequences. The sequences can be used in gene and protein polymucleotide sequences. (I) and the polypeptides encoded by the sequences can be used in gene and protein the sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2001-356160/37
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    polypeptides in samples
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 1; Page 2140; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Polymorphic nucleic acid sequences,
                                                                                                                                                                                                                                                                                                         gene therapy; human; ss; melanoma;
                                                                                                                                                                                                                                                                                                                                     Human cyclin-dependent kinase 10,
                                                                                                                                                                                                                                                                                                                                                                       12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (CURA-) CURAGEN CORP.
WPI; 2004-411721/38
                                                                                           06-NOV-2002;
23-JUL-2003;
                                                                                                                                                                                                                                                                                        melanoma
                                                                                                                                                                                                                                                                                                                                                                                                       AD056498
                                                                                                                                                                                                                                                                                                                                                                                                                                       ADO56498
                              Roth RB,
                                                                                                                                            06-NOV-2003; 2003WO-US035879
                                                                                                                                                                            27-MAY-2004
                                                                                                                                                                                                          WO2004044164-A2
                                                                                                                                                                                                                                        Homo sapiens
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                                                            SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AGGATGAAGTGCAGTGGTGATCACAGCTCACTGCAGCCT 512
                                                                                                                                                                                                                                                                                                                                                                                                                                       standard; DNA;
                                                                                                                                                                                                                                                                                        associated
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AGGTTGCAGTGACCCAGGATCGTGCCACTTCACTCCAGCCT 1
                              Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 9 A; 16 C;
                                                                                            2002US-0424475P
2003US-0489703P
                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                       ed polymorphic variation; SNP;
polymorphism; cyclin-dependent kinase 10; CDK10;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.6%;
                                Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                         18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16
                                                                                                                                                                                                                                                                                                                                                                                                                                         ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 15.4; I
Pred. No. 2e+C
O; Mismatches
                                Þ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    G;
                                Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    10 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                         CDK10 proximal SNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  useful in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2e+03; Length 51;
                                SM;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  genetic testing
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                                                                                                                                                                                                                                                                                                                                         probe #23
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Matches
                  Query Match
Best Local (
                                                                                                                   from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated we melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cyclin-dependent kinase 10, CDK10, proximal SNP pro
                                                                                                                                                                                                                                                                                                                                                                                                                                          Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                             The invention relates to a method of identifying a subject at risk omelanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sar
                                                                                                                                                                                                                                                                                                                                                                                  Example 5;
                                                                                                                                                                                                                                                                                                                                                                                                                       subject.
                                                                            Sequence 18
  15;
                  Similarity
                                                                                                                                                                                                                                                                                                                                                                                  Page
                                                                            BP; 4 A; 6 C; 2 G; 5 T; 0 U; 1 Other;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                  84; 295pp; English.
                    1.5%;
93.8%;
  ۲,
                      Score 15.2; DB 1 Pred. No. 1.7e+03
    Mismatches
                                           DB 1;
    0
                                         Length 18;
      Indels
    0;
                                                                                                                                                                                                                                                                                                            acid sample
      Gaps
                                                                                                                          probe
                                                                                                                                                                                                                                                                    with
      0
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RESULT 1993
ABZ57114/c
ABZ57114 standard; DNA;
                                                                              867 GGGATTACAGGCGTGA
                                                         18 BGGATTACAGGCGTGA
  41
                                                                                882
   ВP
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밁 S

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ABZ57114;
CN1355220-A.
                        Homo sapiens
                                                    peptic ulcer;
                                                                  Human;
                                                                                             Human KIAA0608 protein 10.12 probe,
                                                                                                                          24-MAR-2003
                                                    KIAA0608 protein 10.12; ulcer; diabetes; probe;
                                                                                                                           (first entry
                                                     recombinant production; gene therapy; ss.
                                                                                               SEQ
                                                                                                  ij
                                                                                                  NO: 9
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26-JUN-2002.

24-NOV-2000; 2000CN-00127565

24-NOV-2000; 2000CN-00127565

(UYFU-) UNIV FUDAN

мао Y,

WPI; 2003-000145/01

Polypeptide-human KIAA0608 protein 10.12 and polynucleotide encoding #

6; Page 22 (Disclosure); 35pp; Chinese.

The invention relates to human KIAA0608 protein 10.12 (ABP58674) and nucleic acids encoding it (ABZ57108). The protein has a molecular weight of 10 kD. The invention also relates to a method for the recombinant production of the protein, an antagonist of the protein, and the use of the protein, gene and antagonist in therapeutic applications. KIAA0608 protein 10.12 can be used in the treatment of a variety of diseases such as peptic ulcers and diabetes. Sequences ABZ57113-ABZ57114 represent human KIAA0608 protein 10.12 probes used in an exemplification of the

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RESULT 1994
AAI79765/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SXS
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Best Local &
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                                                                          by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic polymorp
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 41 BP; 6 A; 11 C; 14 G; 10 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; single nucleotide polymorphism; SNP; genome; gene therapy; protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   invention
                                                                                                                                                                                                                                                                                                                                                associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or example, in a patient's genome that affect the activity of polypeptides the control of polypeptides are the control of polypeptides.
                                                                                                                                                                                                                                                                                                                                                                                                                                          sequences (I), which contain single nucleotide polymorphisms (SNPs).

AAM53114 to AAM53329 represent peptides related to human polymorphic
polynucleotide sequences. The sequences can be used in gene and protein
therapy, and in vaccine production. (I) and the polypeptides encoded by
them may be used in the prevention, diagnosis and treatment of diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human nonconservative amino acid changing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAI79765 standard; DNA; 51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 1; Page 2557; 2653pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2001-356160/37
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Shimkets RA, Leach M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               30-NOV-1999; 99US-0168138P.
29-NOV-2000; 2000US-00726173
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  07-JUN-2001.
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                                                        polypeptides in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAI73060 to AAI79867
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Polymorphic nucleic acid sequences, useful in genetic testing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (CURA-) CURAGEN CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      30-NOV-2000; 2000WO-US032758.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 36 TGCAGCGAGCCAAGATTGCGTCACTGCA 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
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                                                           samples
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   represent isolated human polymorphic polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP
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Pred. No. 2.2e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SNP nucleic acid SEQ:6706
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1; Length 41;
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Query Match Best Local Similarity

1.5%;

Score 15.2; DB 1; Length 51; Pred. No. 2e+03;

Sequence 51

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A;

17 C; 15 G; 11 T; 0 U; 0 Other;

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RESULT 1995
AAI79764/c
ID AAI79764 standard;
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                             S
                                                                                                                                                                        AA173060 to AA179867 represent isolated human polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPB).

CRAM53114 to AAM5329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be used as antigens in the production of polypeptides encoded by (I) may be used as antigens in the production of polypeptides encoded by (I) may be used as antigens in the production of be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic polypeptides.
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Matches
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                                                                                             Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; single nucleotide polymorphism; SNP; genome; protein therapy; vaccine; probe; diagnostic assay; quantitation; restorative therapy; polymorphic; ds.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAI79764;
                                                                                                                              Sequence 51 BP; 8 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Claim 1; Page 2557; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2001-356160/37.
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29-NOV-2000; 2000US-00726173.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Polymorphic nucleic acid sequences, useful in genetic testing and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Shimkets RA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (CURA-) CURAGEN CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             655
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 45
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                                                                              Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TGCAGTGAGCCAAGATTGCGCCACTGCA 18
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                           TGCAGTGGCGCAATCTTGGCTCACTGCA 682
 TGCAGTGAGCCAAGATTGCACCACTGCA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Leach M;
                                                                                                                                                               samples
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                                                                              1.5%;
                                                                                                                              16 C; 15 G;
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                                                              0;
                                                                               Score 15.2; DB 1; Length Pred. No. 2e+03;
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                                                            Mismatches
                                                                                                                                12
                                                                                                                                T; 0
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                                                                                                                                U; 0 Other;
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                                                                  Indels
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                                                                                                 51;
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                                                              Gaps
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RESULT 1996
AAL27794
ID AAL2779
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                                                                                                                                                                                                 The present invention relates to oligonucleotides encoding polymorphic CC variants of proteins related to amylases, amyloid proteins, angiopoietin, CC apoptosis related proteins, cadherin, cyclin, polymerase, oncogenes, CC histones, kinases, colony stimulating factors, complement related proteins, cytochromes, kinesins, cytokines, interferons, interfeukins, Grotein coupled receptors and thioesterases. The present sequence is one such oligonucleotide. The oligonucleotides and the peptides encoded by CC them may be used in the prevention, diagnosis and treatment of diseases CC associated with inappropriate expression of the proteins listed above. Disorders that may be prevented, diagnosed and/or treated include CC multifactorial diseases with a genetic component, such as autoimmune CC diseases (e.g. rheumatoid arthritis, multiple sclerosis, diabetes, CC systemic lupus erythromatosus and Grave's disease), inflammation, cancer (e.g. cancers of the bladder, brain, breast, colon and kidney, carceric lupus erythromatosus brain, breast, colon and kidney, carceric lupus erythromatosus system and an infection of pathogenic CC remarks.
                                                                           Matches
                                                                                                           Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Immunosuppressive; immunostimulatory; antiinflammatory; cytostatic; neuroprotective; antimicrobial; gene therapy; vaccine; amylase; cancer amyloid protein; angiopoietin; apoptosis related protein; cadherin; cyclin; polymerase; oncogene; histone; kinase; colony stimulating fact; complement related protein; cytochrome; kinesin; cytokine; interferon; interleukin; G-protein coupled receptor; thioesterase; inflammation; multifactorial disease; autoimmune disease; infection; nervous system disease; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Polymorphic nucleic acids encoding e.g. amylases, cyclins, polymerases, oncogenes and histones, useful for diagnosing and treating, e.g. cancer, autoimmune diseases and infections.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2001-465210/50.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             28-DEC-1999; 99US-0173419P
27-DEC-2000; 2000US-00173419
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        28-DEC-2000; 2000WO-US035498
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human SNP oligonucleotide #1002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  24-JAN-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAL27794 standard; DNA; 51
                                                                                                                                                  Sequence 51 BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 1; Page 1666; 4143pp; English.
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                                    717
                                                                                           Similarity
                                    CCCAGCCTCCTGAGTAGCTGGGACTACAGGCGCCCACCACGCCT 760
CCCAGCTCCTTGGGAGGCTGAGACAGGAGGATTCCTTGAGCCCT
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                                                                                                                                                  10
                                                                                                                                                  A; 13 C; 16 G; 12 T; 0 U; 0 Other;
                                                                                           1.5%;
                                                                       Pred. No. Ze+
                                                                                           Score 15.2;
Pred. No. 2
                                                                                           2; DB 1; Length 51;
2e+03;
                                                                           Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cancer;
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RESULT 1997 AAI73760/c

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RESULT 1998
AAI79697
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                                                                                                                                                                                                                                                                                                              Query Match
Best Local S
Matches 20
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              30-NOV-1999; 99US-0168138P.
29-NOV-2000; 2000US-00726173.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                30-NOV-2000; 2000WO-US032758
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAI73760 standard; DNA; 51 BP.
                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 51 BP; 9 A; 19 C; 13 G; 10 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  polypeptides in samples
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAI73060 to AAI79867
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 1; Page 268; 2653pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Polymorphic nucleic acid sequences, useful in genetic testing
                       09-NOV-2001
                                                                    AAI79697;
                                                                                                            AAI79697 standard; DNA; 51 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          therapy.
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                                                                                                                                                                                                                                                                   655 TGCAGTGGCGCAATCTTGGCTCACTGCA 682
                                                                                                                                                                                                                         35
                                                                                                                                                                                                                                                                                                                20;
                                                                                                                                                                                                                                                                                                                                        Similarity
                                                                                                                                                                                                                           TGCAGTGAGCCGAGATTGCATCACTGCA
                                                                                                                                                                                                                                                                                                                1.5%;
llarity 71.4%;
Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Leach M;
                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              represent isolated human polymorphic polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             nucleic acid SEQ:701
                                                                                                                                                                                                                                                                                                                  0; Mismatches
                                                                                                                                                                                                                                                                                                                                     Score 15.2;
Pred. No. 2
                                                                                                                                                                                                                                                                                                                                          2e+03;
                                                                                                                                                                                                                                                                                                                                                             DB 1;
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                                                                                                                                                                                                                                                                                                                                                               Length 51;
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Human conservative amino

acid changing

SNP nucleic acid SEQ:6638

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                                                                                                                                                                                                                                                                                                       RESULT 1999
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cc AMM53114 to AAM53329 represent peptides related to human polymorphic contains (SNPs).

cc polymucleotide sequences. The sequences can be used in gene and protein contains the polymorphic polymorphic contains production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases contained with inappropriate expression of polymorphic polypeptides. For contained the polymorphic polypeptides. For contained the polymorphic polypeptides or contained the patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own contained the polypeptides of polypeptides by expressing inactive proteins or to supplement the patients own contained the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The considers may also be used as antigens in the production of contained the presence of similar nucleic. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic construction of antibodies may also be used as diagnostic agents for detecting the presence of polymorphic construction of polymorphic pol
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local S
Matches 26
Enzymatic nucleic acid; ribozyme; trans cleavage; inhibition; gene expression; downregulation; interleukin-5; IL-5; ICAM-1; intercellular adhesion molecule; rel A; tumour necrosis facto
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; single nucleotide polymorphism; SNP; genome; gene they protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                Human ICAM
                                                                                                                                             25-MAR-2003
25-MAR-1997
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 1; Page 2537; 2653pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     30-NOV-1999; 99US-0168138P.
29-NOV-2000; 2000US-00726173.
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                                                                                                                                                                                                                                                            AAT52114 standard; RNA; 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            polypeptides in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Polymorphic nucleic acid sequences, useful in genetic testing
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                                                                                                                                                                                                                                                                                                                                                                                                                        1028 AAGCAGCTGGGATTACGGGCACCTGCCACCACCCCCGCTAATT 1071
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                               AATTAGCTGGGCGTGGTGGCGGCGCCTGTAATCCCAGCTACTT
                                                                                        hammerhead ribozyme target sequence (nt. position 2860).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
ilarity 59.1%;
Conservative
                                                                                                                                        (revised)
(first entry)
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23-SEP-1994;
28-SEP-1994;
03-OCT-1994;
07-OCT-1994;
11-OCT-1994;
04-NOV-1994;
10-NOV-1994;
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06-JUL-1994;
15-AUG-1994;
16-AUG-1994;
17-AUG-1994;
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15-APR-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             TNF-alpha; respiratory syncytial virus; RSV; bcr-abl; oncogene; translocation; chronic myelogenous leukaemia; CML; cancer; philadelphia chromosome; inflammation; autoimmune disease; atherosclerosis; myocardial infarction; stroke; restenosis; transplant rejection; rheumatoid arthritis; psoriasis; myocardial ischaemia; Kawasaki disease; septic shock; HIV; human immunodeficiency virus; acquired immune deficiency syndrome; AIDS;
                                                                                                                                                                                                                                                                                                                                                                                                                                         04-APR-1994
07-APR-1994
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23-SEP-1994
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94US-0030030
94US-00311486
94US-00311749
94US-00314397
94US-00316771
94US-0031692
94US-0031992
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94US-00363233.
95US-00380734.
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94US-00337608.
94US-00345516.
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94US-00291932.
94US-00291433.
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94US-00228041.
94US-00245736.
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94US-00224483.
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94US-00218934.
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(RIBO-) RIBOZYME PHARM INC

Grimm S, Modak A, Tracz D, Stinchcomb b DT, Chowrira B, Direnzo A, Draper KG, Dudycz LW; Karpeisky A, Kisich K, Matulic-Adamic J, Mcswiggen JA; Pavco P, Beigleman L, Sullivan SM, Sweedler D, Thompson Usman N, Wincott FE, Woolf T; g;

Ribozymes having modified bases and in inhibiting disease related genes. methods for producing them ı for use

Claim 2; Page 175; 407pp; English.

The present sequence represents a preferred target sequence for an enzymatic nucleic acid (i.e. a ribozyme) which cleaves ICAM-1 mRNA at the nucleotide base position indicated in the DE line. Regions of the mRNA that do not form secondary folding structures and that contain potential hammarhead and hairpin ribozyme cleavage sites were identified by computer analysis. Ribozymes directed against these mRNA sequences were designed and synthesised with modifications that improve their nuclease resistance. The ribozymes cleave the ICAM-1 target sequences and thereby inhibit ICAM-1 expression, making them useful for reducing transplant rejection and alleviating symptoms in patients with rheumatoid arthritis, asthma and other inflammatory disorders. (Updated on 25-MAR-2003 to

Sequence 15 ₽P; ω A ω ü σ ٥. 0 ij Ç,

Length 15;

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AAX30969
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Matches 12; Conserv
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Best Local :
                                                               Query Match
Best Local S
                                                   Matches
                                                                                                                                             AAX30947-31815 represent tag sequences of transcripts that are differentially expressed in colorectal cancer, in pancreatic cancer, or in both. The tag sequences can be used to identify genes by matching the tag to a gen data base member, or by using the tag sequences as probes to isolate unidentified genes from cDNA libraries. The tag sequences can also be used in a method for diagnosing colon or pancreatic cancer in a sample suspected of being neoplastic. The method comprises comparing the level of at least one transcript in a first sample of a tissue to a second sample, where the first sample is a colonic tissue suspected of being neoplastic sample is a normal human colonic tissue. The transcript is identified by a tag selected from AAX30947-31815. The methods of the invention can be used in the diagnosis, prognosis and
                                                                                                                                                                                                                                                                                                                                                          Use of isolated gene transcripts - useful for developing products diagnosis, prognosis and treatment of cancers, particularly colon pancreatic cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 1999-070161/06.
                                                                                                                                                                                                                                                                                                                                                                                                                                              Vogelstein B,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    21-MAY-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          26-NOV-1998
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Tag sequence; colorectal cancer; pancreatic cancer; colon cancer;
diagnosis; prognosis; treatment; ss.
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                                                                                                         Sequence
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                                                                                                                                    treatment of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   725 ССТСАСТАССТСССА 739
                        198
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                                                                Similarity
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                         CATGITGGTCAGGCT 212
                                                                                                         15 BP; 2 A; 3 C; 5 G; 5 T; 0 U; 0 Other;
CATGTTGGTCAGGCT 15
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                                                   Conservative
                                                                                                                                    cancer
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                                                                Score 15;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mismatches
                                                      Mismatches
                                                                DB 1; L
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                                                                               Length 15
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                                                     Indels
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AAF98058 ID AAF XX

AAF98058 standard; DNA; 15 BP

RESULT 2001

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AAF97989/
ID AAF9
XX
AC AAF9
XX
AC AAF9
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DT 19-J
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                                                                                                                                                                                                                                                                                                               The present invention describes an isolated polynucleotide (I) comprising CC a nucleotide sequence (S) which is a polymorphic variant of a reference CC sequence for the human immunoglobulin E receptor I alpha subunit (IGERA) CG gene or its fragment. The polymorphic variant comprises at least one CC polymorphism selected from guanine (G) at polymorphic site (PS) 1, PS9, PS10 or PS21, cytosine (C) at PS2, PS3, PS6, PS12, PS318 or PS20, adenine (C) At PS5, PS7, PS31, PS313, PS14, PS35, PS15, PS12 and thymine (T) at CC PS4, PS8, PS16 or PS31, Or (G) at a position corresponding to nucleotide CC 251, (A) at a position corresponding to nucleotide S30. (I) can be used in gene CC therapy. (I) is useful for therapeutic purposes. A polypeptide (II) conceasure the binding affinity of one or more candidate drugs targeting CC (II). An antibody (III) to (II) is useful to immunoprecipitate (II) from CC solution and also reacts with (II) on Western or immunoprecipitate (II) is also useful in immunoassays to detect (II) in biological samples. AAP97965 to AAP98096 represent IGERA gene polymorphism detection primers; and CC AAP98140 represent IGERA gene polymorphism detection primers; and CC AAP98141 to AAP98180 represent IGERA gene PCR primers which are used in the exemplification of the present invention
                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                            Query Match
Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Chew A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   09-AUG-1999;
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                  19-JUN-2001
                                                AAF97989;
                                                                                                                                                                                                                                                                                         Sequence 15 BP; 2 A; 8 C; 2 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 15; Page 23; 99pp; English.
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                                                                               AAF97989 standard; DNA; 15
                                                                                                                                                                                                                                          Local
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                                                                                                                                                                                                                           15; Conserva
                                                                                                                                                            \vdash
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                                                                                                                                                              CACCTGCCTCAGCCT 15
                                                                                                                                                                                                                            Conservative
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                  (first entry)
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                                                                                                                                                                                                                                          100.0%;
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                                                                                  ΒP
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Pred. No.
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                                                                                                                                                                                                                                                           DB 1; Length 15;
                                                                                                                                                                                                                                            1.6e+03;
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Human IGERA allele specific oligonucleotide probe SEQ ID

NO:28

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RESULT 2003
AAF98057/c
ID AAF9805
XX
AC AAF9805
XT 19-JUN-
XX
DT 19-JUN-
XX
Human I
XX
Human;
KW Human;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention describes an isolated polynucleotide (I) comprising a nucleotide sequence (S) which is a polymorphic variant of a reference sequence for the human immunoglobulin E receptor I alpha subunit (IGERA) gene or its fragment. The polymorphic variant comprises at least one polymorphism selected from guanine (G) at polymorphic site (PS) 1, PS9, PS10 or PS21, Cytosine (C) at PS2, PS3, PS6, PS12, PS18 or PS20, adenine (G) at pS2, PS3, PS6, PS12, PS18 or PS20, adenine (C) at PS4, PS8, PS16 or PS17, or (G) at a position corresponding to nucleotide 302 or 741, and (T) at PS4, PS8, PS16 or PS17, or (G) at a position corresponding to nucleotide 302 or 741, and (T) at a position corresponding to nucleotide 530. (I) can be used in gene cancoded by (I) is useful for therapeutic purposes. A polypeptide (II) measure the binding affinity of one or more candidate drugs targeting (II). An antibody (III) to (II) is useful to immunoprecipitate (II) from solution and also reacts with (II) on Western or immunoblots of polyacrylamide gels on membrane supports or substrates. (III) is also useful in immunoassays to detect (II) in biological samples. AAF97965 to AAF98040 represent IGERA gene polymorphism detection primers; and CC AAF98141 to AAF98181 represent IGERA gene polymorphism detection primers; and CC the exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                             Best Local Similarity Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                               Query Match
Best Local S
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 Human; polymorphism; immunoglobulin E receptor I alpha subunit; IGERA; single nucleotide polymorphism; SNP; allele specific oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 15 BP; 2 A; 1 C; 8 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New polynucleotide for gene therapy, comprises nucleotide polymorphisms in the immunoglobulin \mathtt{E} receptor I alpha subunit gene.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WO200111010-A2
                                                        Human IGERA allele specific oligonucleotide probe SEQ ID NO:96
                                                                                                19-JUN-2001
                                                                                                                                                                        AAF98057 standard; DNA; 15 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 15; Page 21; 99pp; English.
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Pred. No.
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                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
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AAF6943B
ID AAF6943
XX AAF6943
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XX IB-APR-
XX IB-APR-
XX Human I
XX Polymox
KW WO20010
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                                                                                                                                                                                                                                                                                                                                              밁
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention describes an isolated polynucleotide (I) comprising CC anucleotide sequence (S) which is a polymorphic variant of a reference CC sequence for the human immunoglobulin E receptor I alpha subunit (IGERA) CC gene or its fragment. The polymorphic variant comprises at least one CC polymorphism selected from guanine (G) at polymorphic site (PS) 1, PS9. CC PS10 or PS21, cytosine (C) at PS2, PS3, PS6, PS12, PS18 or PS20, adenine CC (A) at PS5, PS7, PS11, PS13, PS14, PS15, PS19, or PS22 and thymine (T) at CC PS4, PS8, PS16 or PS17, Or (G) at a position corresponding to nucleotide S10. (I) can be used in gene CC 151, (A) at a position corresponding to nucleotide S20. (I) can be used in gene CC a position corresponding to nucleotide S30. (I) can be used in gene CC encoded by (I) is useful for therapeutic purposes. A polypeptide (II) CC encoded by (I) is useful in drug screening assays and in assays troe CC (II). An antibody (III) to (II) is useful to immunoprecipitate (II) from CC control and also reacts with (II) on Western or immunophotes of CC useful in immunoassays to detect (II) in biological samples. AAF99956 to AAF99096 represent IGERA gene polymorphism detection primers; AAF98097 CC AAF99140 represent IGERA gene polymorphism detection primers; AAF98097 CC AAF99141 to AAF98180 represent IGERA gene PCR primers which are used in CC the exemplification of the present invention
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 15; Page 23; 99pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New polynucleotide for gene therapy, comprises nucleotide polymorphisms in the immunoglobulin {\tt E} receptor I alpha subunit gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2001-202766/20
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                                                                       Polymorphism; human; interleukin 4 receptor-alpha; IL4R-alpha; allergic disease; probe; ss.
                                                                                                                                                                        18-APR-2001
                                                                                                                                                                                                                                                 AAF69438 standard; DNA; 15
                                     Homo sapiens
                                                                                                                                                                                                             AAF69438;
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                                                                                                                                                                                                                                                                                                                                                                                  383 CCTCCCAAAGTGCTG 397
                                                                                                                              IL4Ralpha gene
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                                                                                                                                probe #78
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Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                              Human;
serial
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human
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                    WPI; 2002-153821/20
                                                                                                                                                  20-MAY-1998;
                                                             Vogelstein
                                                                                                                                                                                                20-MAY-1998;
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                                                                                                           (Oryu)
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                                                                                                                                                                                                                                                                                                                                                                                            colon cancer; colorectal cancer; pancreatic cancer; SAGE tag; analysis of gene expression; diagnostic; prognostic; probe;
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                                                                Kinzler
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               is a probe for human IL4R-alpha
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                                                                                                           HOPKINS
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Pred. No.
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Disclosure; Col 13; 161pp; English.
                                                                     New human nucleic acid containing specific SAGE tags, useful diagnostic markers for cancer, also derived probes.
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that has the same sequence as a mRNA found in humans and is a SAGE (serial analysis of gene expression) teg comprising a single stranded probe containing at least 10 consecutive nucleotides. SAGE tags, are diagnostic and prognostic markers of cancer, especially of the colon and pancreas. ABK31900-ABK32770 represent human colon and pancreatic cancer Sequence 15 SAGE tags of the invention ₿P; relates to 2 A; 3 C; 5 G; 5 T; 0 U; 0 Other; an isolated, purified human nucleic acid found in humans and is a SAGE a SAGE Ξ and

밁 S Query Match Best Local S Matches 15 198 CATGTTGGTCAGGCT 212 15; 1 CATGTTGGTCAGGCT 15 Similarity Conservative 100.0%; 0 Score 15; Pred. No. Mismatches 1.6e+03; DB 1; 0 Length 15; Indels 0; Gaps

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RESULT 2006 ADE14250/c SNP; glaucoma; progressive ocular hypertensive dis glaucoma related disorder; motif; repeat element; 09-OCT-2003. US2003190617-A1. Homo Human; optineurin; ds; ophthalmological; single nucleotide polymorphism; Optineurin promoter motif, repeat element or regulatory 29-JAN-2004 ADE14250; ADE14250 standard; DNA; sapiens. (first entry) 15 hypertensive disorder; regulatory region region

(SIEE/) (RAYM/) 06-MAR-2002; 06-MAR-2002; 2002US-00091281 (MORI/) SI E. RAYMOND V. MORISSETTE 2002US-00091281 ٩.

optineurin promoter to New nucleic acid sequences of the optineurin gene are useful to polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin promoter to diagnose, prognose and treat glaucoma and optineurin glaucoma and optineuring glaucoma and optineuring glaucoma and optineurin glaucoma and optineuring glauco diagnose, prognose detect related

WPI; 2003-864168/80.

Raymond

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Claim 11; SEQ ID NO 361; 159pp; English

The invention relates to an isolated nucleic acid (N1) comprising at least 20 but not more than 1500 consecutive nucleotides of the optineur promoter appearing as ADE13890. Also included are the optineurin promote operably linked to a heterologous nucleic acid, a nucleic acid capable detecting a single nucleotide polymorphism (SNP) in the optineurin promoter, a host cell comprising the promoter operably linked to a heterologous sequence, diagnosing the promoter operably linked to a heterologous sequence, diagnosing or prognosing glaucoma in a sample obtained from a cell or bodily fluid (comprising detecting a polymorphi in a promoter region of the optineurin gene, associated with a glaucoma between the comprising the promoter region of the optineurin gene, associated with a glaucoma between the comprising the promoter region of the optineurin gene, associated with a glaucoma between the comprising the comprising the promoter region of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision of the optineurin gene associated with a glaucoma between the comprision gene phenotype), detecting a SNP variation gene, associated with a glancerariation in a sample e optineurin rin promoter d capable of

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Matches 15;
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The invention relates to an isolated nucleic acid (N1) comprising at least 20 but not more than 1500 consecutive nucleotides of the optineurin promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of detecting a single nucleotide polymorphism (SNP) in the optineurin promoter, a host cell comprising the promoter operably linked to a heterologous sequence, diagnosing or prognosing glaucoma in a sample obtained from a cell or bodily fluid (comprising detecting a polymorphism
                                                                                                                                                                                                                                                                                                                                                                                                            New nucleic acid sequences of the optineurin gene are useful to copolymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and
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) RAYMOND V.
) MORISSETTE
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                                                                                                                                                     Novel neural thread protein peptide, referred as cell death peptide, useful for treating prostatic hyperplasia, psoriasis, eczema, dermat atherosclerosis, cosmetic modification to skin, throat, mouth, muscl
                                                                                                                                                                                                                                                                                                                            19-JUL-2001; 2001US-0306150P.
19-JUL-2001; 2001US-0306161P.
16-NOV-2001; 2001US-0331477P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Cytostatic; Antibacterial; Immunosuppressive; Antiinflammatory; neural thread protein; NTP; tumour; ds.
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P-PSDB; ABR63260.
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referred to as cell death peptide. Thought to be cytostatic, antibacterial, immunosuppressive and antiinflammatory. It is useful for treating a condition in a patient requiring removal or destruction of cells, for treating a condition such as benign or malignant tumor, inflammatory disease. But offermine disease and information of the cells, for treating a condition such as benign or malignant tumor, inflammatory disease. But offermine disease and information disease.

disease, autoimmune disease and infectious disease.

treatment

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from the

веquence

inflammatory

Disclosure; Page 18; 77pp; English.

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RESULT 2009
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         a pancreatic thread protein. The peptide is conjugated, linked or bound to a molecule chosen from antibody or its fragment, antibody-like binding molecule, where the molecule has a higher affinity for binding to a tumor or other target than binding to other cells. Treatment using NTP peptides can remove benign tumors with less risk and fewer of the undesirable side effects of surgery. The present sequence is an NTP encoding sequence
                                                                                                              mRNAs, amplifying the released tags, concatenating form concatenated tags, amplifying and isolating The present sequence is human tandem tag DNA
                                                                                                                                                                                                                    Generating five prime biased tandem tag libraries of cDNAs by isolating sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the
                                                                                                                                                                                                                                                                                                                                                                                                            06-MAR-2002;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Tandem tag; concatenated tag; human;
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                                                                                                                                                                                  Disclosure;
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                                                                                        Sequence 16 BP;
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                                                                                                                                                              present invention discloses a method for generating
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                        CC detectable mucleic acid probes, and determining the hybridization of the sample by determining the hybridization of the one or CC more detectable nucleic acid probes to the target genomic nucleic acid of CC the sample. The genomic nucleic acid is contained in a fixed tissue or a CC cell, and the sample is metaphase spreads, interphase nucleic or nucleic CC found in paraffin embedded tissue material or frozen tissue sections. The CC probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid reference array. CC with the mixture of the probe under suitable hybridization conditions, CC contacting the array with treated mixture of sample and control genomic nucleic acid and the array with treated mixture of sample and control genomic contacting the array with treated mixture of sample and control genomic contacting the array with treated mixture of sample and control genomic contacting the array with treated mixture of sample and control genomic contactions, of the signals from the differential labels of the array to the contaction of the probes to genomic nucleic acid, thus determining one or more variations in copy numbers of sequences in the control. The hybridization of the genomic contaction of the genomic control is fragment, that is specific for a nucleic acid/nucleic acid hybrid. The sample of genomic contaction of the detectable moiety such that hybridization of the genomic contaction of the detectable moiety such that hybridization contaction of the detectable moiety such that hybridization contaction and to be tested and the reference of contaction of the detectable label on the one or more genomic contaction of the detectable moleic acid that is prepared from the cone or more genomic contaction of the detectable moleic acid that is prepared from the cone or more genomic contaction of the detectable moleic acid that is prepared from the cone or more genomic contaction of the detectable moleic acid that is prepared from the cone or more 
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present sequence represents a non-nucleotide probe. The probe is useful for suppressing the binding of one or more detectable nucleic
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        The present sequence represents a non-nucleotide probe. The probe is useful for suppressing the binding of one or more detectable nucleic acid probes, that are greater than 100 base pairs and that have been derived from genomic nucleic acid, to one or more undesired sequences in an assay for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the one or more detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the target genomic or more detectable nucleic acid probes to the target genomic nucleic acid of the sample. The genomic nucleic acid is contained in a fixed tissue or a cell, and the sample is metaphase spreads, interphase nucleic or nucleic found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid and control genomic nucleic acid, which are differentially labelled, the array or both the sample and control genomic nucleic acid and the array with treated mixture of sample and control genomic nucleic acid and the array with treated mixture of sample and control genomic nucleic acid and the array to that caused by hybridization of the probes to genomic nucleic acid, thus that caused by hybridization of the probes to genomic nucleic acid, thus
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Best Local Similarity
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 copy numbers of sequences
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    sequence of genomic nucleic
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Best Local :
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                                                                                                                                                                                                                                 New nucleic acid that modulates expression of the vanilloid receptor-1, useful for control of pain or sensitivity disorders, comprises sequence from control regions of the receptor gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 pain transmission; primary sensory neuron; transcription factor;
detection; MZF1; NFkappaB; NFAT; GATA1; sensitivity disorder; analgesia;
hypalgesia; hyperalgesia; neuralgia; myalgia; human.
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pain transmission; primary sensory neuron; transcriptic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human VR1
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                                                                                                                                                                                                       Disclosure; Page 53; 68pp; German.
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Pred. No.
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                                                                                                                                                                                                                                                  sequences
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segment having at least one region that modulates expression of the VR1 (vanilloid receptor type 1) receptor, or a functional derivative, allele or fragment of this region, or a sequence that hybridises to it under standard conditions. The VR1 modulator is derived from one or more of positions 221931-223344 of GenBank AL670399, 31673-36359 of AL663116, or 44731-43231 or 36616-33151 of AP1668787 and is involved in transmission of pain, particularly in primary sensory neurons. The invention also describes a vector that contains the VR1 medulator, host cells containing this vector (other than human germ or embryonal stem cells) and a method for modulator genession of the VR1 receptor by introducing the modulator or the vector into a cell that contains the VR1 gene. The

This invention describes a novel nucleic acid containing a specific

products of the invention are used for detecting a transcription factor

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RESULT 2013
AAA22972/c
ID AAA2297
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             from its binding to a regulatory sequence (or a double-stranded oligonucleotide fragment of it), e.g. by Western blotting or enzymelinked immunosorbant assay, particularly for diagnosis of diseases associated with overexpression or underexpression of the transcription factor. The region that modulates VR1 receptor expression includes a binding site for a transcription factor, e.g. MZF1, NFkappaB, NFAT or GATA1. The nucleic acids of the invention, or vectors containing them, are used for prevention or treatment of pain, also for treating sensitivity disorders, e.g. analgesia, hypalgesia or hyperalgesia, also neuralgia and myalgia, that are associated with activity of the VR1 receptor. This sequence represents a fragment of human VR1 exon 1d DNA which is capable of binding to a transcription factor.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot wine stain; Sturge Weber syndrome; ss. kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA171367 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17560 and AAA17625 represent tribozyme sequences. AAA17625 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences; AAA17655 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19-JUN-2000
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                                                                                                                                                                                                                                                                                                                                                                                                                                                     07-OCT-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Integrin subunit beta 3 substrate sequence SEQ ID NO:6198.
                                                                                                                                                                                                                                                                                                                                                                                                                  24-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WO9950403-A2
                                                                                                                                                                       Claim
                                                                                                                                                                                                                                                                                                                                        (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Local
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                                                                                                                                                                       54; Page 254; 305pp; English
                                                                                                                                                                                                          ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        l Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     standard;
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                                                                                                                                                                                                                                                                                                   Roberts
                                                                                                                                                                                                        encoding
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                                                                                                                                                                                                                                                                                                     Jarvis
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Pred. No
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                                                                                                                                                                                                                           expression and/or stability
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                                                                                                                                                                                                                                                                                                     Mcswiggen JA;
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RESULT 2014
AAA87041/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         CC and AAA19155 to AAA19222 represent their corresponding target sequences;
CC AAA1923 to AAA20361 and AAA21501 to AAA21595 represent ribozyme
CC AAA21596 to AAA21688 represent their corresponding target sequences;
CC AAA21596 to AAA21688 represent their corresponding target sequences;
CC AAA21689 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sequence
CC AAA21689 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sequence
CC AAA23422 represent their corresponding target sequences. The ribozyme of
CC the invention are used for modulating the synthesis, expression and/or
CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are
CC especially used to treat cancer, diabetic retinopathy, age related
CC macular degeneration (ARMD), inflammation, and arthritis, as well as
CC neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris,
CC angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber
CC syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome,
CC integrin subunit alpha-6, or integrin subunit beta-3
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Best Local
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                                                                                                                                                                                                                                                        18-FEB-1999;
21-JUL-1999;
25-AUG-1999;
                                                                          sequence by using an enzyme oligonucleotide probe hybridized identifier nucleotides
                                                                                                                                                                                                                                                                                                                                                                                                                                Detection; nucleic acid hybrid; depolymerisation; analysis; SNP; single nucleotide polymorphism; identification; viral load; prob genotyping; medical marker diagnostic; primer; target; mutation; genetic disease; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17 BP;
                                                                                                                                                       WPI; 2000-565377/52.
                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Probe to Alu2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     15-JAN-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAA87041
                                                                                                                                                                                   Andrews
                                                                                                                                                                                                 Shultz JW,
                                                                                                                                                                                                                                                                                                                 18-FEB-2000; 2000WO-US004242.
                                                                                                                                                                                                                                                                                                                                                                          WO200049180-A1
                                                                                                                                                                                                                             (PROM-)
                                                                                            rmining presence or absence of a predetermined endogenous nucleic sequence by using an enzyme that depolymerizes the 3' end of an onucleotide probe hybridized to a target sequence to release
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              776 ATTTTTAGTAGAGAT 790
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                                                                                                                                                                                                                             PROMEGA CORP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ATTTTAGTAGAGAT
                                                                                                                                                                                                 Lewis MK,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                   Hartnett
                                                                                                                                                                                                                                                       99US-00252436.
99US-00358972.
99US-00383316.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        human gene
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JR, Gu
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Pred. No.
                                                                                                                                                                                   Ήĥ
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                                                                                                                                                                                   Mandrekar M, Kephart
Olson RJ, Wood KV, I
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    u; 0
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                                                                                                                                                                                                     Rhodes
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The present invention describes a method (M1) presence or absence of a predetermined endoger sequence (ENAT). The method comprises hybridia

l endogenous hybridising

determining nucleic acid a probe havi

acid ta

for

Page 373; 389pp; English.

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RESULT 2015
ADB04312
ID ADB0431
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Best Local Sim:
Matches 15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             depolymerises the 3' end of hybridised NA to release the INS. MI is used for determining the number of known sequence repeats present in a nucleic acid target sequence in a nucleic acid target sequence in a nucleic acid target sequence in a sample is an allele from a homozygous or heterozygous locus. The method is also useful for detertion of mutations, translocations and SNPs in nucleic acids including those associated with genetic disease), determination of viral load, species identification, sample contamination, and analysis of forensic samples. AAA86791 to AAA87079 and AAB1217 represent sequence which are used in the exemplification of the present invention. N.B.

There is a discrepancy between the SEQ ID NO; and sequences given in the
                                                                                                                                                                                           New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 4 A; 4 C; 7 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            EP1281758-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human MDZ7 scanning oligonucleotide SEQ ID 5298.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADB04312 standard; DNA; 17 BP
                                                                                                                                                                                                                                                                                                                                                                           02-AUG-2001; 2001US-00922181
                                                                                                                                                                                                                                                                                                                                                                                                          30-JUL-2002; 2002EP-00016874
                                                                                                                                                                                                                                                                                                                                                                                                                                            05-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           developmental disorder; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          20-NOV-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  examples, and the SEQ ID NO: and sequences given in the sequence listing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  identifier nucleotide (IN) with ENAT which is treated with an enzyme that
lepolymerises the 3' end of hybridised NA to release the INs. M1 is used
                                                                                                                                                                                                                                                                              2003-423107/40
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  the present invention
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                                                                                                                                                                                                                                                                                                         Gu Y,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
                                                                                                                                                                                                                                                                                                           Nguyen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 15;
; Pred. No.
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                                      Query Match
Best Local S
Matches 15
                                                                                                                                             caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                            Sequence 17 BP; 2 A; 2 C; 9 G; 4 T; 0 U; 0 Other;
                                                         Local Similarity
   647
                                        15;
                                        Conservative
                                                         100.0%;
                                                                            1.5%;
                                        0
                                                           Score 15; Pred. No.
                                        Mismatches
                                                                            DB 1;
                                                           1.7e+03
                                                                          Length 17;
                                        Indels
                                        <u>,,</u>
                                        Gaps
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밁
20-NOV-2003 (first entry)
                                                      ADB04280 standard;
                                                                                                                                          GGCTGGAGTGCAGTG 661
                                                                                                                         GGCTGGAGTGCAGTG 17
                                                    DNA; 17
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developmental disorder; ss. Cytostatic; immunostimulant; Human MDZ7 scanning oligonucleotide SEQ ID zinc finger protein; MDZ3; MDZ4; MDZ7; chromosome 6p21.3-22.2; chromosome 16p Homo sapiens gene therapy; vaccine; human; DZ4; MDZ7; MDZ12; chromosome 7q22.1 mosome 16p11.2; chromosome 15q26.1; 5266 cancer;

30-JUL-2002; 2002EP-00016874.

02-AUG-2001; 2001US-00922181

(AEOM-) AEOMICA INC

Shannon M, Gu Y, Nguyen

WPI; 2003-423107/40.

New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer. MDZ3,

Example 8; SEQ ID NO 5266; 103pp; English.

RESULT 2016
ADB0428
XX ADB0428
XX ADB0428
XX ADB0428
XX ZO-NOVXX ZOC STORM CYCOSTS
XW WPI; 2
XW CYCOSTS
XW WPI; 2
XW CYCOSTS
XW WPI; 2
XW CYCOSTS
XW MPI; 2
XW CYCOSTS
XW or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention. proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, The present invention relates to novel human zinc finger-containing

Sequence 17 BP; 4 A; 1 C; 4 G; 8 T; 0 U;

The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic

and proteins are also useful

for diagnosing

or

a disease

Example 8;

SEQ ID NO

5298; 103pp; English

MDZ3,

Query Match Best Local :

Similarity

1.5%;

Score 15; Pred. No.

1.7e+03; DB 1;

Length 17;

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ADB04285
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                                                                 Query Match
Best Local S
Matches 15
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                                                                                                                                                                                                            proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 and characterize gross are alterations in MDZ3, MDZ4, MDZ7, or MDZ12 and characterize gross are
                                                                                                                                                              useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2003-423107/40.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Shannon M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              02-AUG-2001; 2001US-00922181
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                30-JUL-2002; 2002EP-00016874.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      developmental
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  chromosome 6p21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      zinc finger protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human MDZ7 scanning oligonucleotide SEQ ID 5271
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       20-NOV-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ADB04285 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (AEOM-) AEOMICA INC.
                                                                                                                                  Sequence
                                                                                                                                                                                                                                                                                                                                                                                                      The present invention relates to novel human zinc finger-containing
                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 8; SEQ ID NO 5271; 103pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                614 TTTTTTGAGACAGAG
                                 617
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                                                                                  Similarity
                                                                                                                                    17 BP; 4 A; 2 C; 5 G; 6 T; 0 U; 0 Other;
                                 TTTGAGACAGAGTCT 631
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    immunostimulant; gene therapy; vaccine; human;
protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1;
protein; MDZ3; MDZ4; MDZ12; chromosome 15q26.1; cancer;
al disorder; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gu Y,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                   Conservative 0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Nguyen C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DNA;
                                                                                                    1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17
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                                                                   Score 15; DB 1; Length 17; Pred. No. 1.7e+03; o; Mismatches 0; Indels
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                                                                      Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                MDZ3,
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RESULT 2019
ABZ60598
ID ABZ6059
XX
AC ABZ6059
XC ABZ6059
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ABZ60369/c
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Matches
                                                                                                                                                                                                                                            Query Match
                                                                                                                                                                                                                                                                                                              The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, enuman immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66535 represent substrate/target sequences for the human riboxymez of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human; ribozyme; short interfering enzymatic nucleic acid; H-Ras; N-Ra anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human K-Ras DNAzyme substrate #481.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               21-MAR-2003 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ABZ60369 standard; RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-MAY-2002; 2002WO-US016840
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WO200297114-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens.
                                                                                                                                                                                                                                                                           Sequence 17 BP; 14 A; 1 C;
                                                                                                                                                                                                                                                                                                        ribozymes of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 58; Page 94; 185pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mcswiggen J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                Local
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                                                                                                                                                                                                                                   Similarity
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                                                                                                                                                                                                                   larity 100.0%;
Conservative (
                                                                                                                                                                                                                                               1.5%;
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                                                                                                                                                                                         609
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ВP
                                                                                                                                                                                                                                                                            o
G;
                                                                                                                                                                                                                                  Score 15; Pred. No.
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                                                                                                                                                                                                                       Mismatches
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                                                                                                                                                                                                                                                                              U; 0 Other;
                                                                                                                                                                                                                                               DB 1;
                                                                                                                                                                                                                                     1.7e+03;
                                                                                                                                                                                                                                               Length 17;
                                                                                                                                                                                                                      Indels
                                                                                                                                                                                                                         0
                                                                                                                                                                                                                         Gaps
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Human K-Ras DNAzyme substrate #710.

21-MAR-2003

(first entry)

ABZ60598; ABZ60598

standard; RNA; 17

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RESULT 2020
ACC65847
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Best Local S
Matches 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59389 - ABZ6216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66595 represent substrate/target sequences for the human in heart of the inventor of the substrate of target sequences for the human in heart of the sequences are substrate.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                    Murine organizatio; virucide; neuroprotective; nootropic; neuroreprotective; contropic; neuroreprotective; nootropic; neuroreprotective; neurorepr
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17
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06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
                                                    WO2003025176-A2
                                                                                                                  Mus musculus
                                                                                                                                                                                                                                                                                                                         Murine oligonucleotide associated with tumour supression, SEQ ID 3094.
                                                                                                                                                                                                                                                                                                                                                                                       01-JUL-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 58;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mcswiggen
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                                                                                                                                                                       schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ACC65847 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ribozymes of the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2003-140484/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          769 TTTTTGTATTTTAG 783
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             short interfering RNA and enzymatic nucleic acid useful for ing cancer, modulates the expression of a nucleic acid encoding K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     BP; 3 A; 0 C; 3 G; 0 T; 11 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                             88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  11;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 15; DB 1;
Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Length 17;
                                                                                                                                                                                                                                                                 neuroleptic; murine;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0
                                                                                                                                                                                                         disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gaps
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ACA62876/c
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Best Local S
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as grobes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti) sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases the component of tumours or cell degeneration, are characterised by development of tumours or cell degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 2 A; 7 C; 3 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                21-JUL-1999;
25-AUG-1999;
                                                                                                                                                                                                                                                                                                              Repeated nucleic acid detection method, human probe Alu2
                                                                                                                                                                                                                                                                                                                                        21-AUG-2003
                                                                                                                                                                                                                                                                                                                                                               ACA62876;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Telerman
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17-SEP-2002; 2002WO-IB004210
                                                WPI; 2003-479484/45.
                                                                       Mandrekar MN,
                                                                                              (MAND/) MANDREKAR M
(TERE/) TEREBA A.
(SHUL/) SHULTZ J W.
                                                                                                                                                                                     15-DEC-2000; 2000US-00739909.
                                                                                                                                                                                                                                     US2003022163-A1
                                                                                                                                                                                                                                                              Homo sapiens
                                                                                                                                                                                                                                                                                       Repeated nucleic
                                                                                                                                                                                                                                                                                                                                                                                        ACA62876
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            specifically cancer but also Alzheimer's
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention relates to murine oligonucleotides (ACC62754-
                                                                                                                                                                                                             30-JAN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           532
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ATCCTCCTGCCTCAG
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                                                                                                                                                                                                                                                                                                                                                                                       standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                    ATCCTCCTGCCTCAG
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Amson R,
                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                       Tereba
                                                                                                                                              99US-00358972.
99US-00383316.
                                                                                                                                                                                                                                                                                       acid
                                                                                                                                                                                                                                                                                                                                                                                       DNA;
                                                                                                                        z
                                                                      Þ
                                                                                                                                                                                                                                                                                       detection; human; alu; probe; ss.
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                                                                        Shultz JW
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    <u>,,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score 15;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ,7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  for preparation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        that
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Determining presence or absence of desired nucleic acids that contain multiple repeats of predetermined nucleic acid target sequences in a sample, by using nucleic acid hybridization methods.

Claim 1; Page

27; 31pp; English

The second

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention describes a method of determining presence or absence of a CC desired nucleic acid (NA) that contains multiple repeats of a CC predetermined NA target sequence in a NA sample. The method involves CC providing a treated sample that may contain the desired NA in which CC several predetermined repeating NA target sequences are hybridised with a CC NA probe, analysing for presence of hybridised NA containing the NA CC probe, and thereby the presence or absence of the desired NA. The method CC is useful for determining the presence or absence of desired nucleic codes that contain multiple repeats of a predetermined NA target CC sequence, in a NA sample obtained from a biological sample, where the CC repeated sequence includes several predetermined repeated sequence that codifier in length and/or sequence. The methods can be efficiently used for CC distinguishing human and bacterial NA. The method is highly sensitive, CC and enables detection and quantification of the presence of a NA without CC the need to undergo a NA target sequence enrichment step prior to a NA CC hybrid detection step. The method enables rapid and accurate detection of the desired NA that contains multiple repeats of a NA target sequence. This sequence represents a probe used to detect the human Alu repeat sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     RESULT 2022
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
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04-DEC-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 17
                                                                               New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                   cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; primer; probe; tumour suppression; tumour reversion; apoptosis;
                                                                                                                                                                                Telerman
                                                                                                                                                                                                                                                                                  17-SEP-2002; 2002WO-IB004219.
                                                                                                                                                                                                                                                                                                                  15-MAY-2003
                                                                                                                                                                                                                                                                                                                                                   WO2003040369-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                     virus resistance; transgenic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Tumour suppression/reversion associated nucleotide #3446
                                                                                                                                                   WPI; 2003-441574/41.
                                                                                                                                                                                                                 (MOLE-) MOLECULAR ENGINES LAB
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         CTCTGTCACCCAGGC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 CTCTGTCACCCAGGC 649
                                                                                                                                                                                P,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP; 4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                  2001FR-00011981.
                                                                                                                                                                                Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.5%;
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                                                                                                                                                                                Tuijnder
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 15;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                     animals; Alzheimer's
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schizophrenia;

WO2003025177-A2

27-MAR-2003

88;

The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides,

Disclosure; Page 434;

771pp;

French

in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or

This invention relates to novel isolated nucleic acid sequences involved

Disclosure; SEQ ID NO 1488; 30pp; French

New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.

associated antibodies

WPI;

2003-313354/30

Telerman

P

Amson R,

Tuijnder M;

(MOLE-)

MOLECULAR ENGINES

17-SEP-2001; 2001FR-00011980

17-SEP-2002; 2002WO-IB004523

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
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Best Local 9
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      tumour suppression; tumour reversion; apoptosis; virus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human tumour suppression/reversion-related DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADI48985 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Homo
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP; 1 A;
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Pred. No.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.7e+03;
hes 0;
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RESULT 2024
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Best Local Similarity
Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention. Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO
development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention. Note: The sequence data for this patent did not form part of the printed
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADI48613 standard; DNA;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17-SEP-2002; 2002WO-IB004523
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO2003025177-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer; PCR; gene
cell degeneration;
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                                                                                                                                                                                                                                                                                                                                                                       in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Disclosure;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human tumour
                                                                                                                                                                                                                                                                                                                                                                                                                                               This invention relates to novel isolated nucleic acid sequences involved
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               gene chip; antisense; viral diseas
ation; cancer; Alzheimer's disease;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 cells.
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Pred. No.
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                                       The invention relates to a novel method for identifying a subject at risk of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current sequence is that of an Extend primer (also described as probe) of the invention which was used to genotype human intercellular adhesion molecule ICAM-1/ICAM-4/ICAM-5 gDNA. ICAM-1 (human rhinovirus receptor, BB2 (CD54;cell surface glycoprotein P3.58) has been mapped to chromosomal position 19p13.3-p13.2, ICAM-4 (landsteiner-Wiener blood group;LW) has been mapped to chromosomal position 19p13-2-cen and ICAM-5.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          specification, but was obtained in electronic format directly from WIPO
at ftp.wipo.int/pub/publishedpct_sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CD54; cell surface glycoprotein P3.58; ICAM-4; Landsteiner-Wiener blood group; ICAM-5; telencephalin; chromosome 19p13; ss; primer; PCR; SNP; single nucleotide polymorphism; probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADP45893
                                                                                                                                                                                                                                                                                                                                  Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPKIO, KIAA0861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WO2004047623-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        breast cancer; cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Extend primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         26-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADP45893;
                                                                                                                                                                                                                                                                                       Example 4; Page 84; 289pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2004-441051/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                 Roth RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-NOV-2003; 2003WO-US037948.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                10-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  24-JUL-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-NOV-2002;
                            (telencephalin)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ntercellular adhesion molecule; ICAM-1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          primer; PCR; SNP; single nucleotide
                                                                                                                                                                                                                                                                                                                       a subject.
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15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TGCAGTGGTGTGATC 495
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17 BP; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2002US-0429136P.
2003US-0490234P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        85 used to genotype human ICAM-1/ICAM-4/ICAM-5 SNP
                             has been mapped to chromosomal position
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Pred. No.
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1.7e+03
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                                                                                                                                                                                                                                                                                                                                                                                                                                     Reneland
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RESULT 2026
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Matches 15
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                                                                                                                                                                                                                                                                                                   Primer t63-r2 and t63-f2 (see AAV62682) are based on the 3' untranslated region of the human Tango-63 gene. They were used in mapping studies of the Tango-63 gene. The gene has been mapped on the Stanford Human Genome Center G3 radiation hybrid panel close to marker D8S1734 with a LOD score of 6. This map position is located in the most frequently lost region of chromosome 8 between markers D8S133 and NEFL. Tango-63 is alternatively spliced (see AAV62672-73) to produce the Tango-63d and Tango-63e polypeptides (see AAW79260-61) of the invention. Tango-63 nucleic acids and polypeptides are used in methods for the diagnosis and treatment of apoptosis-related disorders such as cancer, autoimmune and neurodegenerative disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Isolated tumour necrosis factor related proteins - used to develop products for the diagnosis and treatment of apoptosis-related disorders, e.g. cancers, auto:immune disorders or neuro:degenerative disorders.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16-APR-1998;
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AAH47613;
                                  AAH47613 standard;
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15; Conservative
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                                                                                                                                                GCTCAAGCGATTCTC 1012
                                                                                                                                                                                                                                                                     18 BP; 4 A; 6 C; 3 G;
                                                                                                                           GCTCAAGCGATTCTC 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         tumour necrosis factor receptor related protein; human; cancer; autoimmune disease; neurodegenerative disease; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Page 67; 88pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Conservative
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                                    DNA;
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Pred. No.
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                                                                                                                                                                                                                                                         AAS13563
                                                                                                                                                                                                                                                                          RESULT 2028
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Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                        Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The invention provides antisense compounds capable of inhibiting the expression of human Her-3, a member of epidermal growth factor (EGF) family of receptor/tyrosine kinases. The antisense oligonucleotides are useful for inhibiting the expression of Her-3 in cells or tissues. They are commonly used as research reagents and in diagnostics for example, to elucidate the function of particular genes. The antisense compounds are also useful for distinguishing between functions of various members of a biological pathway and for research use. They are also utilized for distinguishing between functions of various members of a biological pathway and for research use. They are also utilized for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Antisense compounds capable of modulating expression of human Her-3, member of epidermal growth factor family of receptor/tyrosine kinases, useful for preventing or delaying infection, inflammation or tumor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Her-3; epidermal growth factor; EGF; receptor/tyrosine kinase; human; antiinflammatory; cytostatic; antibacterial; antisense; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                biological pathway and for research use. They are also utilized for diagnostics, therapeutics, prophylaxis and in kits. They are useful prophylactically, e.g. to prevent or delay infection, inflammation or tumor formation. Sequences AAH47532-47615 represent chimeric antisense phosphorothicate oligonuclectides having 2'-MOE wings and a deoxy gap,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   31-JUL-2000; 2000US-00630706.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             21-AUG-2001.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human Her-3 mRNA inhibiting
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 30-NOV-2001
                                                                      Human; VMGLOM; glomulin; venous malformation glomangioma; PCR primer; STS; sequence tagged site; PAC 10406; ss.
                                                                                                                         PCR primer 1 used to amplify PAC 10406 (70 SP6) clone STS sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 1; Col 43-44; 49pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Bennett CF, Cowsert LM;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (ISIS-)
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   WO200160856-A2
                                                                                                                                                                 17-DEC-2001
                                                                                                                                                                                                                                        AAS13563 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                    1116
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 for the inhibition of Her-3 mRNA expression
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          2001-535134/59
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                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
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Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present invention relates to the isolation of novel human and mouse VMGLOM polypeptides (long form and short form), and the nucleic acid molecules encoding them. VMGLOMs (also referred to as glomulins) are a subtype of venous malformations (VMS) called glomangiomas. In humans, VMGLOM has been mapped to chromosome 1p21-22. VMGLOMs and the nucleic acids encoding for them are useful as a medicament or for incorporation into a diagnostic kit. Such medicaments are useful for preventing, treating or alleviating disorders with a vascular component, particularly where alteration of vascular smooth muscle cell phenotype is needed, e.g. varicosities, cardiopathies or cardiomyopathies, cerebral disorders and cancer. The nucleic acids are also useful in gene therapy. The present sequence for PCR primer 1 is used to amplify PAC 10406 (70 SP6) clone STS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New VMGLOM genes and polypeptides, useful in gene therapy or for preventing, treating or alleviating disorders with vascular component, e.g. varicosities, cardiopathies, cerebral disorders or cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16-FEB-2000; 2000EP-00870022.
10-APR-2000; 2000US-0195777P.
22-DEC-2000; 2000EP-00870320.
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                                08-NOV-2001;
09-NOV-2001;
                                                                                      25-OCT-2001;
08-NOV-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                      Neurodegenerative disease; uPA; SNCG; Alzheimer's disease; neuroprotective;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; Page 70; 157pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2001-557643/62
                                                                                                                                                                             25-OCT-2002; 2002WO-US034679
                                                                                                                                                                                                                                                                                               WO2003054143-A2
                                                                                                                                                                                                                                                                                                                                                                                                                 Chromosome 10;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human KNSL1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADE43701 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sequence in the methods of the present invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             880
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           TGAGCCACCACGCCC 894
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  PCR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   larity 100.0%;
Conservative
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     2001US-0338010P.
2001US-0338363P.
2001US-0337052P.
                                                                                         2001US-0339525P.
2001US-0336929P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2001WO-EP001760
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            primer, SEQ ID 306.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    տ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    A.
                                                                                                                                                                                                                                                                                                                                                                                                                 primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    C; 3 G; 1 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                 88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 15; DB 1; L; ; Pred. No. 1.8e+03; 0; Mismatches 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                         IDE; KNSL1; LIPA; TNFRSF6;
nootropic; gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Indels
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RESULT 2030
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ID ABX1128
XX ABX1128
XX Z
AC ABX1128
XX Z
DT 29-APR-
XX Human;
KW Human;
KW multipl
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          predisposition for or the occurrence of neurodegenerative disease in a subject. The method comprises detecting in a target nucleic acid obtaine from the subject the presence or absence of an allelic variant of one or more polymorphic regions of one or more genes selected from upA (Urokinase plasminogen activator), SNCG (gamma-synuclein), IDE (insulindegrading enzyme), KNSLI (Kinesin-like protein 1), LIPA (lysosomal acid lypase), and TNFRSF6 (Tumour Necrosis Factor Receptor-SF6), where the presence of at least one of the allelic variant of one or more polymorphic regions is indicative of a predisposition for or the occurrence of neurodegenerative disease. The genes are all located on chromosome 10. MI is useful for determining a predisposition for or the occurrence of, and for treating neurodegenerative disease, particularly Alzheimer's disease. The present sequence is a PCR primer, which was use in the method of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human; ss; PCR; inflammation; viral encephalitis; meningitis; multiple sclerosis; stroke; Alzheimer's disease; polycythaemia vera; hyperproliferative myeloid disease; chronic myelogenous leukaemia; HIV infection; autoimmune disease; systemic lupus erythematosus; rheumatoid arthritis; type I diabetes; septic shock; graft rejection; cerebral malaria; cachexia; cardiovascular disorder; angina pectoris; myocardial infarction; hypertension; atherosclerosis; primer; haematologic disease; aplastic anaemia; chronic neutropaenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Determining a predisposition for or the occurrence of neurodegenerative disease, e.g. Alzheimer's disease by detecting in a target nucleic acid the presence or absence of an allelic variant of one or more polymorphic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18 BP; 3 A; 6 C; 4 G; 5 T; 0 U; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Example 3; Page 291; 848pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human Tango-63
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (NEUR-)
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    14-NOV-2000; 2000US-00712726
                                                                                                                                                                                                                                                                                                                                                                                                                                                 myelodysplastic
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                                                                                           16-MAR-2001; 2001US-00811088.
                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      730 GTAGCTGGGACTACA 744
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GEN HOSPITAL
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, Mullin KM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 invention relates to a method (M1) for determining
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         mapping primer t63-r2.
                                                                                                                                                                                                                                                                                                                                                                                                                                                     syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DNA; 18
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Sampson AJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tango-63;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                          chromosome
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Blacker DL;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Tanzi RE,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Bertram
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0
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RESULT 2031
ADE77489
ID ADE7748
XX ADE7746
AC ADE7746
XX ADE7746
XX DT 29-JAN-
XX Y BS; hun
KW BS; hun
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KW cerebro
KW motor I
KW prolife
KW prolife
KW prolife
KW atheroi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention relates to an isolated nucleic acid molecule encoding thymotaxin (also known as Tango-45), Tango-63d, Tango-637e, Tango-67, or CC huchordin polypeptide, including sequences 90% identical to them, CC fragments of at least 15 nucleotides and allelic variants. Also included care a host cell or a non-mammalian host cell containing the novel nucleic acid, the encoded polypeptides (or allelic variants, sequences 90% cidentical or fragments), an antibody or antibody substance that containing the novel nucleic selectively binds with one of the proteins, and identifying a compound containing the novel nucleic selectively binds with one of the proteins, and identifying a compound contain the protein and/or modulates the proteins activity. Thymotaxin is a member of the C-C family of chemokines, Tango-63e and -d are members of the tumour necrosis factor superfamily, Tango-67 is a continuous of the containing and treating disorders continuous proteins and treating disorders are useful for diagnosing and treating disorders continuous proteins and treating disorders continuous proteins and treating disorders continuous proteins and treating disorders are useful for diagnosing and treating disorders continuous proteins and treating disorders are useful for diagnosing and treating disorders continuous proteins and treating disease). The polypeptides are useful disease (e.g. viral encephalitis, viral or polypeptides and antitions are disorders in the gene and the continuous leukaemia or polycythaemia vera), HIV infection; autoimmune diseases (e.g. systemic continuous proteins are useful arthritis, type I diabetes, septic shock, and the continuous proteins are useful for generating antibodies, which are therapeutically useful. The mucleic acid molecules are useful for mutations or polymorphisms in the gene. The methods are useful for identifying compounds that modulate the expression or activity of the polypeptides. The present sequence is a PCR primer used to map the Tango-
                                                                                                                                                                                                                                                                                                                                                                                                뭉
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid molecule encoding thymotaxin (Tango-45), Tango-63d, Tango-67e, Tango-67, or huchordin polypeptide, useful for diagnosing and treating disorders, e.g. cancer, inflammation, stroke or diabetes.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Page 19; 79pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Holtzman DA, Gearing DP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                      motor neuron disorder; myopathy; muscle metabolic disease; proliferative disorder; heart disorder; ischaemic heart disease;
                                                                   cerebrovascular
                                                                                                                                                                                                  29-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (YYMAG)
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(GEAR/) GEARING D F
                                                                                        huchordin;
                                                                                                                                                                                                                                                                                      ADE77489 standard; DNA; 18
                                                                                                          human;
                                                                                                                                                                                                                                                                                                                                                                                                                                     998 GCTCAAGCGATTCTC 1012
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Similarity
                                                                                                                                                       chromosome mapping primer #2.
                                                                                      thymotaxin; Tango-45; Tango 63d; Tango-63e; Tango-67; Tango-66; brain disorder; inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                  (first entry)
                                                          disease; tumour; skeletal muscle disorder;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ַם
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 15;
Pred. No.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1.8e+03;
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DE Huma
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                                                                                                                                                                                                                              RESULT 2032
                                                                                                                                                                                                                                                                                                                                                                                                      Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      16-APR-1997;
26-SEP-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Nucleic acid encode a C-C family chemokine, thymotaxin, two polypeptides similar to the TNF receptor superfamily, a soluble growth factor and huchordin are useful to treat skeletal muscle, heart, cardiovascular and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16-JUL-1999; 99US-00354809.
14-NOV-2000; 2000US-00712726.
10-JAN-2001; 2001US-00757421.
16-MAR-2001; 2001US-00811088
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                            Human neurodegenerative disease-related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         disorders. The present sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2004-009153/01
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (MILL-) MILLENNIUM PHARM INC
                                                                                25-MAR-2004
                                                                                                                                                                               ADH54179
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cell disorder; chromosome mapping; primer.
                                                                                                                                                                                                                                                                                                                                                     998 GCTCAAGCGATTCTC
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                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                               standard; DNA; 18
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                                                                                (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.5%;
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0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                             1.8e+03;
                                 PCR primer SeqID306
                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
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ADO48722/c
ID ADO487
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XX 12-AUG
XX 12-AUG
XX Human :
XX KW human;
KW mannos
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25-OCT-2001;
02-NOV-2001;
                                                                                                                                                                                                                                                                                               for or the occurrence of neurodegenerative disease comprising detecting in a target nucleic acid obtained from the subject the presence of an allelic variant of polymorphic regions of human genes selected from urokinase plasminogen activator (uPA), gamma-synuclein (SNCG), insulin degrading enzyme (IDE), kinesin-like protein 1 (KNSL1), lysosomal acid lipase (IIPA) and tumour necrosis factor receptor SP6 (TWFRSF6). The method is useful in determining the presence or predisposition to a neurodegenerative disease, particularly Alzheimer's disease. The present sequence is that of a PCR primer which was used for amplification of a region of the human KNSL1 gene in the exemplification of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 human; neurodegenerative disease; urokinase plasminogen activator; uPA; gamma-synuclein; SNCG; insulin degrading enzyme; IDE; kinesin-like protein 1; KNSLI; lysosomal acid lipase; LIPA; tumour necrosis factor receptor SF6; TNFRSF6; Alzheimer's disease; PCR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Determining a predisposition for or the occurrence of neurodegenerative disease, particularly Alzheimer's disease, comprises determining the presence of a polymorphism in the uPA, SNCG, IDE, KNSL1, LIPA or TNFRSPE
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08-NOV-2001;
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             mannose
                        human;
                                               Human neuropilin 1 (NRP1) extension PCR primer #24.
                                                                        12-AUG-2004
                                                                                                                      ADO48722 standard;
                                                                                                                                                                                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                                                                                                             This invention relates to a novel method of determining a predisposition
                                                                                                                                                                                                                                                                                                                                                                                                                                                 Example
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                                                                                                                                                                                                                                          Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         -NOV-2001;
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                                                                                                                                                                                                       730
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            melanoma;
se receptor
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15; Conserv
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2001US-0336983P.
2001US-0336929P.
2001US-0338010P.
                                                                                                                                                                                                                                                                           BP; 3 A;
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Saunders AJ,
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                                                                                                                                                                                                                              Conservative
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2001US-0337052P.
2002US-0368919P.
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                                                                      (first entry)
            single nucleotide polymorphism; SNP; neuropilin 1; NRP1; C type 2; MRC2; extension PCR; primer; ss; genotyping.
                                                                                                                      DNA;
                                                                                                                                                                                                                                       100.0%;
                                                                                                                                                                                                                                                                            6 C; 4 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                 306;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                205pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mullin
                                                                                                                                                                                                                           ; Score 15; DB 1; Leny
                                                                                                                      ВP
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fullin KM, Sampson
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3, IDE, KNSL1, LIPA or TNFRSF6
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention comprises a method for lucurary...g melanoma. The invention involves detecting the presence or absence or melanoma. The invention involves detecting the presence or absence or or more polymorphic variations associated with melanoma in the neuropi or more polymorphic variations associated with melanoma in the neuropi or more polymorphic variations (MRC2) genes. The method of the invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identifying subjects at risk and treating invention is useful for identification in the invention is useful for identification in the invention is useful for identification in the invention in the invention is useful for identification in the invention in the invention is useful for identification in the invention in the invention is useful for identification in the invention in the 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human; single nucleotide polymorphism; SNP; genome; gene therapy; protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2004-411720/38.
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23-JUL-2003;
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29-NOV-2000; 2000US-00726173.
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                                                                                                                                                     (CURA-) CURAGEN CORP.
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2003US-0489703P.
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                                                        Leach M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             containing nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            100.0%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Þ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Kammerer
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SEQ:8.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    S
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RESULT 2035
AAI76817/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic be used to down agents for detecting the presence of polymorphic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs). AAM53114 to AAM53329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, dignard the polypeptides encoded by them may be used in the prevention of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 1; Page 56; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2001-356160/37
                                                                                                                                                                                                                                                                                                                                                                      Human; single nucleotide polymorphism; SNP; genome; protein therapy; vaccine; probe; diagnostic assay; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                           Human silent SNP containing nucleic acid SEQ:3758.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               09-NOV-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         polypeptides in samples
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Polymorphic nucleic acid sequences, useful in genetic testing
                                                                                                                                                                                                                                                                                                                                        Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAI76817 standard;
                                              Polymorphic nucleic acid sequences, useful in genetic testing and
                                                                                                                                                                                                                                                                        07-JUN-2001
                                                                                                                                                                                                                                                                                                      WO200140521-A2
                                                                                 WPI; 2001-356160/37
                                                                                                                                                                                     29-NOV-2000;
                                                                                                                                                                                                   30-NOV-1999;
                                                                                                                                                                                                                                      30-NOV-2000;
                                                                                                                                                     (CURA-) CURAGEN CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    388
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  CAAAGTGCTGGGATTACAGGCGTGCAGCCGTGCCTGGCC 426
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    CAGTGAGCCGAGATTGCACCACTGCACTCCAGCCTGGGC
                                                                                                                   ₽,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 11 A; 15 C; 17 G; 8 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                   2000US-00726173.
                                                                                                                                                                                                                                      2000WO-US032758.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                 Leach M;
                                                                                                                                                                                                   99US-0168138P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 15; DB 1;
Pred. No. 2e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15; Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 51;
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                                                                                                                                                                                                                                                                                                                                                                                           ; gene therapy; detection;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0
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Claim 1;

Page 1201; 2653pp; English

AAI73060 to AAI79867 represent isolated human polymorphic polymucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs). AAM53114 to AAM53329 represent peptides related to human polymorphic polymucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by

Claim 1; Page 2493; 2653pp;

English.

therapy.

WPI; 2001-356160/37

Shimkets RA,

Leach

(CURA-)

CURAGEN CORP.

Polymorphic nucleic acid sequences, useful in genetic testing

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                                                                                                                                                                                                                                                                           CC sequences (I), which contain single nucleotide polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs).

CC AAM53114 to AAM5329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases comple, (I) may be used to treat disorders by rectifying mutations or completions in a patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own complements of polypeptides and production of polypeptide. Additionally, (I) and its complementary complements and shape be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and complements the presence of similar nucleic acids in samples, and complements the production of polypeptides encoded by (I) may be used as antigens in the production of complements of polypeptides encoded by (I) may be used as antigens in the production of the used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic complements and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic
                                                                                                      Matches
                                                                                                                              Query Match
Best Local :
                                                                                                                                                                                                       Sequence 51 BP; 8 A; 17 C; 13 G; 13 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                             polypeptides in samples
                                                   260 AAGTGCTAGATACAGGACTGGCCACCATGCC 290
34 AGGAGTTCGAGACCAGCCTGGCCAACATGGC
                                                                                                      21;
                                                                                                                                 Similarity
                                                                                                      Conservative
                                                                                                                              1.5%;
                                                                                                      0
                                                                                                                                    Score 15;
Pred. No.
                                                                                                         Mismatches
                                                                                                                                       2e+03;
                                                                                                                                                            DB 1; Length 51;
                                                                                                            10;
                                                                                                            Indels
                                                                                                            °,
                                                                                                              Gaps
                                                                                                              0
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RESULT 2036
                                                                                                                                                                                             Human; single nucleotide polymorphism; SNP; genome; protein therapy; vaccine; probe; diagnostic assay; o
30-NOV-2000; 2000WO-US032758
                                            07-JUN-2001.
                                                                                                                                                                     quantitation;
                                                                                                                                                                                           protein therapy; vaccine;
                                                                                                                                                                                                                                                      Human silent SNP containing nucleic acid SEQ:6492
                                                                                                                                                                                                                                                                                                  09-NOV-2001
                                                                                                                                                                                                                                                                                                                                          AAI79551;
                                                                                                                                                                                                                                                                                                                                                                                    AAI79551 standard; DNA;
                                                                                   WO200140521-A2
                                                                                                                             Homo sapiens.
                                                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                       restorative therapy; polymorphic; ds
                                                                                                                                                                                                                                                                                                                                                                                      51
                                                                                                                                                                                               detection;
                                                                                                                                                                                                                   gene therapy;
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30-NOV-1999; 99US-0168138P 29-NOV-2000; 2000US-00726173

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RESULT 2037
AAI74502
ID AAI7450
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Best Local Simi
Matches 24;
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therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; single nucleotide polymorphism; SNP; genome; gene ther protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                 AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs).

AAM53114 to AAM53329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               30-NOV-1999; 99US-0168138P
29-NOV-2000; 2000US-00726173
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAI74502 standard; DNA; 51
                                                                                                                                                                                                                                                                                                                                                                                                           Claim 1; Page 495; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Polymorphic nucleic acid sequences, useful in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 2001-356160/37
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                30-NOV-2000; 2000WO-US032758
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WO200140521-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human silent SNP containing nucleic acid SEQ:1443.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (CURA-) CURAGEN CORP.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             47
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Leach M;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score
Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            No.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            genetic testing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             φ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               gene therapy;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             <u>,</u>
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                                                                                                                                          For
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RESULT 2038
AAI79093
ID AAI7909
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        Query Match
Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic because as diagnostic agents for detecting the presence of polymorphic
polynucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used to down regulate expression and activity. The antibodies may also
                                                                                                                                                                                                                                                              sequences (I), which contain single nucleotide polymorphisms (SNPs). AAM53114 to AAM53329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human; single nucleotide polymorphism; SNP; genome; gene therapy; protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human silent SNP containing nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAI79093 standard; DNA; 51 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     polypeptides in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI, 2001-356160/37.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Shimkets RA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WO200140521-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            09-NOV-2001
                                                                                                                                                                                                                                                                                                                          AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide
                                                                                                                                                                                                                                                                                                                                                                 Claim 1; Page 2356; 2653pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                           Polymorphic nucleic acid sequences, useful in genetic testing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     30-NOV-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              30-NOV-2000; 2000WO-US032758.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     29-NOV-2000; 2000US-00726173.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (CURA-) CURAGEN CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             260 AAGTGCTAGATACAGGACTGGCCACCATGCC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    21;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                51 BP; 13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AGGAGTTTGAGACCAGCCTGGCCAGCATGGC 33
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Leach M
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         99US-0168138P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     gamples
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  A; 16 C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0
•
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 15; DB:
Pred. No. 2e+0:
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     acid SEQ:6034.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           2e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      10;
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RESULT 2039
AAQ22632/c
ID AAQ2263
RESULT 2040
AAQ20160/c
ID AAQ2016
XX
AC AAQ2016
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Best Local S
Matches 24
                                                                                                                                        Query Match
Best Local (
                                                                                                                             Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         be used as diagnostic agents polypeptides in samples
                                                                                                                                                                                            This antisense oligonucleotide was designed to hybridise to the 3'-UTR human ICAM-1 mRNA. The same sequence was synthesised in phosphodiester and phosphorothioate forms. The oligonucleotides were tested for inhibition of ICAM-1 expression on the surface of interleukin-1-beta-stimulated cells in two different cell lines. The phosphodiester oligonucleotide did not inhibit ICAM-1 expression, but the phosphorothioate (P=S) form did. See AAQ22629-Q22831 and AAQ22633
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAQ22632 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                     14-AUG-1990;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            23-JUL-1991;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  05-MAR-1992.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        triple
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Antisense oligonucleotide #4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-JUL-1992
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAQ22632
                                                                                                                                                                                                                                                                                                                  New oligonucleotides hybridisable to cell adhesion modulators treatment and diagnosis of e.g. allograft rejection, cancer, and diagnosis of intercellular adhesion dysfunction.
                                                                                                                                                                                                                                                                                                                                                                                        Bennett CF,
                                                                                                                                                                        Sequence 18 BP; 4 A; 1 C; 11 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                 WPI; 1992-096579/12.
  AAQ20160;
                        AAQ20160 standard;
                                                                                                                                                                                                                                                                                            Example 5; Page 39; 75pp; English.
                                                                                                       533
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                                                                                 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        helix;
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                                                                                                                                                                                                                                                                                                                                                                                                               SISI
                                                                                                                                        Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              CAMAGIGCIGGGATTACAGGCGIGCAGCCGIGCCIGGCC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        CAGTGAGCCGAGATCACACCATTGCACTCCAGCCTGGAC
                                                                                                       TCCTCCTGCCTCAGCCTC 550
                                                                                TCCTCCCACCTCAGCCTC 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 12
                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                        Mirabelli
                                                                                                                                                                                                                                                                                                                                                                                                               PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   adhesion molecule-1; inhibitor; phosphorothicate bond
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         88.
                                                                                                                                                                                                                                                                                                                                                                                                                                       90US-00567286
                                                                                                                                                                                                                                                                                                                                                                                                                                                            91WO-US005209
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    A; 15 C;
                         DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
                                                                                                                                        1.5%;
                         18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ВP
                         B₽.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 15; DB
Pred. No. 2e+0
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0;
                                                                                                                            0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          targetted to ICAM-1 3'-UTR (2849-2866).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      for detecting the presence of polymorphic
                                                                                                                                       Score 14.8; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ç.
                                                                                                                              Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      T; 0 U; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
2e+03;
                                                                                                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                426
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          51
                                                                                                                                                   Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                              Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              51;
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                                                                                                                              0;
                                                                                                                                                                                                                                                                                                                                AIDS
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                                                                                                                             Gaps
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                                                                                                                              0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Key
modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   deoxyribonucleic acid; major groove; HSV; inverted polarity region;
covalent cross-linking group; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Cross-linking oligomer 723 to target Herpes Simplex Virus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           modified_base
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    25-MAY-1990;
                            12-DEC-1991.
                                                 W09118997-A.
                                                                                                                                                     modified_base
                                                                                                                                                                                                 modified_base
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    90US-00529346
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                                                                                                                                                                                                                                                                                                                                                                                      /*tag= g
/mod_base= OTHER
/note= "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        /*tag= a
/mod_base= OTHER
/note= "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                               /*tag= 1
/mod_base= OTHER
/mote= "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               /note=
                                                                                                                                                                                                                                                                                                                                                                       mod
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        mod
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mod_base= OTHER
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                                                                                                                                                                                                                                                                                                                                                                                                                                             base= OTHER
e= "N-methyl-8-oxo-2'-deoxyadenine"
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                                                                                                                     ase= OTHER
"N-methyl-8-oxo-2'
                                                                                                                                                                                                                "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             "N-methyl-8-oxo-2',-deoxyadenine"
                                                                                                                                                                                                                                                                                                           "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                          "N-methyl-8-oxo-2',-deoxyadenine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               "N-methyl-8-oxo-2'-deoxyadenine"
                                                                          "N-methyl-8-oxo-2'-deoxyadenine"
                                                                                                                                              3
                                                                                                                                                                                                                                                                       inverted_polarity_region
                                                                                                                                                                                                                                                                                                                         OTHER
                                                                                                                                                                                                                                                              comments"
                                                                                                                      -deoxyadenine"
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RESULT 2041
AAQ34110/c
ID AAQ3411
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       This oligomer contains an inverted polarity region formed from an o-xyloso dimer synthon. Residues 11 and 12 are linked via an o-xyloso group (i.e. nucleotides that have xylose sugar linked via the o-xylene ring). The sequence is designed to target the Herpes Simplex virus I beginning at nucleotide 10996 and to covalently cross-link to it. See also AAQ20151
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 1992-007480/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Matteucci
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   25-MAY-1990;
14-JAN-1991;
The sequence is that of a bovine microsatellite sequence obtd. screening a library of bovine MboI DNA fragments of between 25 bp with an (AC)15 and a (TC)15 oligonucleotide pxobe. One out clones cross-hybridised. Assuming independent distribution of
                                                                                                                                                                                                                                                                             genetic
                                                                                                                                                                                                                                                                                                           Sequence of a microsatellite
                                                                                                                                                                                                                                                                                                                                 25-MAR-2003
02-FEB-1993
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New sequence-specific non-photo-activated crosslinking agents - bind to the major groove of duplex DNA and are esp. useful for treating latent
                                                                        Polymorphic bovine DNA markers - used mapping, and selective breeding.
                                                                                                                                                                                                               06-AUG-1992.
                                                                                                                                                                                                                                    WO9213102-A1
                                                                                                                                                                                                                                                         Bos taurus.
                                                                                                                                                                                                                                                                                                                                                                                     AAQ34110 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 4; Page 29; 42pp; English.
                                                                                                       WPI; 1992-284684/34.
                                                                                                                                                                      15-JAN-1991;
                                                                                                                                                                                          15-JAN-1992;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           infections e.g. HIV.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (GILE-) GILEAD
                                                                                                                                                                                                                                                                                       selection;
                                                                                                                                                                                                                                                                                                                                                                                                                                                              594
                                                    7;
                                                                                                                                                                                                                                                                                                                                                                                                                                         18
                                                                                                                            3
                                                                                                                                                 GENMARK.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
                                                                                                                                                                                                                                                                             mapping;
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                                                                                                                            Massey
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 13 A; 0 C; 0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                 (revised)
(first en
                                                   375; 517pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Krawczyk S;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              SCIE INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   90US-00529346
91US-00640654
                                                                                                                                                                      91US-00642342
                                                                                                                                                                                           92WO-US000340
                                                                                                                                                                                                                                                                              primers;
; traits;
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Pred. No. 1.8e+03
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                                                                                  genetic
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                                                                                                                                                                                                                                                                                       cattle;
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RESULT 2042
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Best: Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        microsatellites and MboI sites, the frequency of (76)n >9 microsatellites in the bovine genome is estimated at >100, 000. The sequence information for ca. 230 such bovine microsatellites is summarised in the specification and indexed herein (see below). The sequences upstream and downstream of the microsatellite sequence were used to generate the required PCR primers for in vitro amplification of the corresp. microsatellite (using the program OPTIPRIM). The microsatellites may be used to identify individuals, for parentage testing, and in the genetic mapping of economic trait loci, or genes involved the determinism of economically important traits esp. in cattle, to allow selective breeding. See also AAQ33501-34437. (Updated on 25-MAR-2003 to correct PN field)
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07-DEC-1992
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23-NOV-1990;
18-JAN-1991;
08-APR-1991;
17-APR-1991;
17-APR-1991;
17-APR-1991;
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                                                                                                                                   New oligomers contg. modified bases -doublet in a DNA duplex, for treating herpes malignancy and inflammation.
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91US-00686547.
91US-00766733.
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91US-00683420.
91US-00686544.
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                                                                                                                                          which form a triplex with G-C and diagnosing HIV, hepatitis,
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Claim 12; Page 67; 77pp; English.

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533 TCCTCCTGCCTCAGCCTC

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CC The synthetic oligomer is capable of forming a triplex at physiological CC pH with a purine rich target sequence by coupling into the major groove of the duplex. The specific target sequence of this oligomer is a herpes CC simplex virus I duplex beginning at nucleotide 10996 contg. a purine-rich CC region concentrated on one chain of the duplex. The oligomer, and others CC like it are useful in diagnosis and therapy of diseases characterised by Specific DNA duplex targets, e.g. respiratory syncytial virus, HIV. CC specific DNA duplex targets, e.g. respiratory syncytial virus, HIV. CC form under mild conditions thus assays may be carried out without CC subjecting the test specimen to harsh conditions. The oligomer contains CC an inverted polarity region formed from an o-xyloso dimer synthon. The CC inking gp. is o-xyloso (nucleotides have the 3' positions of xylose CC sugars linked via the o-xylene ring). Two nucleotides are coupled through CC axylene residue to form the dimer synthon. This additional modifications CC may render the oligomer stable to nuclease activity. The oligomer is able to inhibit gene expression, as verified by in vitro systems. See also CC field 1' 2-25501 and AAQ30226-448. (Updated on 25-MAR-2003 to correct PN
                                                                                              RESULT 2043
AAQ62001/c
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                                                          Query Match
                                                                                                                       The sequences given in AAQ61990-2001 are oligonuclectides which contain G4 or G3 stretches and which may be used for inhibiting replication of herpes simplex virus (HSV), activity of HIV, human cytomegalovirus or influenza virus, or for treating inflammatory and neurological disorders caused by phospholipase A2 activity in cases of hyper-proliferation, malignancy, cardiovascular disease and snake bite. Oligonuclectides such as these, may be used for inhibiting division of malignant cells by modualting telomere length, which may also retard aging. (Updated on 25-MAR-2003 to correct PN field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 18 BP; 13 A; 0 C; 0 G;
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04-NOV-1994
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                                                                                              Sequence
                                                                                                                                                                                                                                                                                                  Disclosure; Page 108; 144pp; English.
                                                                                                                                                                                                                                                                                                                                                      New modified oligo-nucleotide contg guanine of viruses, e.g. HIV, and phospholipase A2 a
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Bcker DJ, Vickers TA, Wyatt JR, Imbach JL;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             29-SEP-1992;
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Best Local S
Matches 16
                                                                                                                                                                              Antisense oligonucleotides which target human ICAM-1 were synthesised in both the phosphodiester and phosphorothioatte forms. The oligonucleotides are useful to treat diseases which are modulated by changes in intercellular adhesion molecules. This sequence corresponds to nucleotides 2849-2866 of the 3'- untranslated region of the human ICAM-1 coding sequence. (Updated on 25-MAR-2003 to correct PN field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAQ44515;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AAQ44515 standard; DNA; 18
          25-MAR-2003
03-AUG-1995
                                                                                                                                                                                                                                                         Oligo:nucleotide modulation of cell adhesion - used in the treatment e.g. psoriasis, inflammatory bowel disease or malignant melanoma.
                                                                                                                                                                                                                                                                                                                                                                                                                                      misc_feature
                                                   AAQ75025
                                                                                                                                                                                                                                         Claim 15;
                                                                                                                                                                                                                                                                                  WPI; 1994-100869/12.
                                                                                                                                                                                                                                                                                                                                    21-JAN-1993;
17-MAY-1993;
                                                                                                                                                                                                                                                                                                                                                                                                     WO9405333-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human intercellular adhesion molecule; ICAM-1; cell adhesion; modulation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Antisense oligonucleotide which targets human ICAM-1 3'-UTR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 25-MAR-2003
26-SEP-1994
                                                                                                                                                               Sequence 18 BP; 4 A; 1 C; 11 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                   (ISIS-) ISIS
                                                                                                                                                                                                                                                                                                                                                     02-SEP-1992;
                                                                                                                                                                                                                                                                                                                                                                     27-AUG-1993;
                                                                                                                                                                                                                                                                                                                                                                                      17-MAR-1994.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                antisense
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        .nflammation; psoriasis; malignant melanoma; inflammatory bowel disease;
                                                                                                             533
                                                                                            18
                                                                                                                              16;
                                                                                                                                      Similarity
                                                                                                      TCCTCCTGCCTCAGCCTC 550
                                                   standard;
                                                                                            TCCTCCCACCTCAGCCTC 1
                                                                                                                                                                                                                                        Page 49; 101pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               oligonucleotide; therapy; 88.
                                                                                                                                                                                                                                                                                                   Mirabelli
                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (revised)
(first en
                                                                                                                                                                                                                                                                                                                    PHARM INC.
         (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                   92US-00939855.
93US-00007997.
93US-00063167.
                                                                                                                                                                                                                                                                                                                                                                     93WO-US008101
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                                                  RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 entry)
                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                     "opt. in phosphorothicate form"
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ورو
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                                                                                                                             0;
                                                                                                                                      Score 14.8; DB 1, Pred. No. 1.8e+03,
                                                                                                                               Mismatches
                                                                                                                                              DB 1;
                                                                                                                                              Length 18
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method involves binding the antigen to a solid support and then reacting it with an immunoreactive ligand (L) bound to an oligo; removing any CC unreacted L, and then detecting the presence of the oligo. A similar CC method can be used to detect hys, in which case the ligand is an oligo-CC labelled Ag. The use of an amplifiable oligo as the label allows Ag or Ab CC can be detected at very low levels. An exemplary olgi is AAQ75024 which CC can be covalently attached by the 5'- terminus to the N-or C-terminal of CC oligo AAQ75024 using disuccinimidyl suberate. Serum samples suspected to CC contain HEV Abs were immobilised on plastic tubes or wells, then CC incubated for 30-60 mins with the peptide-oligo proruct. The vessels were washed; bound oligo was released with 0.2M glycine and amplified in a CC separate tube using as primers AAQ75025 and AAQ75026 in 30 cycles of PCR. CC The amplification product - AAQ75031 - was treated with uracil DNA CC immoblised oligo-dT. (Updated on 25-MAR-2003 to correct PN field')
                                                                                                                                                                                                                                                                                                                                                         RESULT 2046
AAT01742/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic oligo;
                                                  peptide nucleic acid; PNA; intercellular adhesion molecule; ICAM-1;
endothelial leukocyte; ELAM-1; vascular; VCAM-1; antiinflammatory;
anticancer; antimetastatic; anti-AIDS; anti-rhinoviral; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 1995-006819/01.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         24-NOV-1994.
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                                                                                                                                                                                                                                                                         AAT01742;
                                                                                                                                                                                                                                                                                                                            AAT01742 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18 BP; 0 A; 0 C; 0 G; 0 T; 18 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                13-MAY-1993;
Synthetic.
                                                                                                                                                           Peptide Nucleic acid oligomer targetting ICAM-1 3'-UTR.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (USSH ) US DEPT HEALTH & HUMAN
                                                                                                                                                                                                                    L8-DEC-1995
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TTTTATTTTATTTTTTT 445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                 (first entry)
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                                                                                                                                                                                                                                                                                                                               DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 14.8;
Pred. No. 1.6
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 18;
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Location/Qualifiers

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                                                                                                                                                                                                                       RESULT 2047
AAQ95465/c
                                                                                                                                                                                                                                                                                                                                                                Matches
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim 2; Page 35; 57pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    inflammation, viral infection, cancer etc.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 1995-090842/12
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Bennett CF, Mirabelli CK;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 05-AUG-1993;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   05-AUG-1994;
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                                              primer; polymerase chain reaction; PCR; linkage study; locus; microsatellite marker sequence; automated genotyping; allele;
                                                                                                    Primer Al (Group 4,
                                                                                                                                                                       AAQ95465;
                                                                                                                                                                                                       AAQ95465 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 18 BP; 4
                                  polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        av peptide nucleic acid oligomers hybridising to adhesion molecule genes
are stable anti:sense cpds. of high affinity, partic. for treating
                                                                                                                                                                                                                                                                                                                            533
                                                                                                                                                                                                                                                                                            18
                                                                                                                                                                                                                                                                                                                                                                16;
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                                                                                                                                                                                                                                                                                                                     TCCTCCTGCCTCAGCCTC
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                                                                                                                                     (first entry)
                                  detection; Homo sapiens;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 9308-00102650
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/note= "at least one (and preferably all) of the backbone
subunits are composed of amide units, so that the
oligomer consists of the nucleobases attached covalently
to a polyamide backbone"
                                                                                                                                                                                                                                                                                                                                                                                                                                    A; 1 C; 11 G;
                                                                                                    set A) for a human chromosomal marker.
                                                                                                                                                                                                                                                                                                                                                                               1.5%;
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                Mismatches
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RESULT 2048
AAT30216/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Kit for automated genotyping contg. pairs of PCR primers - designed to amplify polymorphic nucleotide repeat sequences, arranged in sets each with a characteristic fluorescence label, useful e.g. in detection of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    08-JUN-1995.
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                                                                                                                    ICAM-1; endothelial leukocyte adhesion molecule-1; ELAM-1; E-selectin; vascular cell adhesion molecule-1; VCAM-1; white blood cell; brequinar; vascular endothelium; allograft rejection; immunosuppression; rapamycin; anti-lymphocyte serum; monoclonal antibody; cardiac allograft; therapy; renal allograft rejection; donor-specific transplant tolerance; LFA-1;
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                                                                                                                                                                                   Antisense oligonucleotide; human; intracellular adhesion molecule-1; ICAM-1; endothelial leukocyte adhesion molecule-1; ELAM-1; E-selecti
                                                                                                                                                                                                                                                                  20-JAN-1997
                                                                                                                                                                                                                                                                                                                                AAT30216 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18
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                           modified_base
                                                                           Synthetic
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                                                                                                                                                                                                                                  oligonucleotide ISIS 1564/1573.
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                                                                                                                                                                                                                                                                   (first entry)
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                                            Location/Qualifiers
                /*tag=
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
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"phosphorothicate or phosphodiester backbone"

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RESULT 2049
AAT94667
ID AAT9466
XX AAT9466
XX AAT9466
XX AAT9466
XX Plavonc
XX Plavonc
XX Flavonc
XX Flavonc
XX Flavonc
XX Flavonc
XX WO97320
XX WO97321
XX PP 04-SEP-
XX PR 01-MAR-
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ICAM-1, ELAM-1, and VCAM-1 represent three of the five cell adhesion molecules involved in the adherence of white blood cells to vascular endothelium. These sequences can be used in a composition for treating allograft rejection. The composition contains one of these sequences in combination with an immunosuppressive agent. The immunosuppressive agent used in the compositions is brequinar, rapamycin, anti-lymphocyte serum, a monoclonal antibody against LFR-1 on antisense oligonuclectide. The compositions can be used for treating or preventing allograft rejection, such as cardiac or renal allograft rejection. By using these compositions, allograft survival times are extended, and donor-specific
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAT30211-T30233, AAT33058-T33112 and AAT36667-T36684 represent antisense oligonucleotides of the invention. These sequences target regions of the coding sequences for human intercellular adhesion molecule-1 (ICAM-1), endothelial leukocyte adhesion molecule-1 (ELAM-1, also known as Eselectin), or vascular cell adhesion molecule-1 (VCAM-1). This sequence targets the 3' untranslated region (nucleotides 2849-2866) of ICAM-1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 18 BP; 4 A; 1 C; 11 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Oligo:nucleotide targetted to a nucleic acid sequence encoding ICAM-1, ELAM-1 or VCAM-1 - useful for treating or preventing allo:graft
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WO9615780-A1
   01-MAR-1996;
                                  28-FEB-1997;
                                                                                                                                   Synthetic.
                                                                                                                                                                                                                                                  27-MAR-1998
                                                                                                                                                                                                                                                                                                                   AAT94667 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             23-NOV-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              30-MAY-1996
                                                                  04-SEP-1997.
                                                                                                  WO9732023-A1.
                                                                                                                                                                snapdragon;
                                                                                                                                                                              Flavonoid 3' hydroxylase; pigmentation; flower colour; transgenic plant;
                                                                                                                                                                                                                   Anchored
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 5; Page 45; 92pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               rejection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 1996-268321/27
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Bennett CF,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (ISIS-) ISIS PHARM INC. (TEXA) UNIV TEXAS SYSTEM.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              22-NOV-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                  533 TCCTCCTGCCTCAGCCTC 550
                                                                                                                                                                                                                                                                                                                                                                                                     18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Similarity
                                                                                                                                                                                                                poly(T) oligonucleotide polyT-AnchA.
                                                                                                                                                                                                                                                                                                                                                                                                 TCCTCCCACCTCAGCCTC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  tolerance is induced
                                                                                                                                                                primer; ss.
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                                                                                                                                                                                                                                                  (first entry
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                                  97WO-AU000124
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              95WO-US015536
   96AU-00008386
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.5%;
                                                                                                                                                                                                                                                                                                                   ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Pred.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 No. 1.8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1; Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Indels
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RESULT 2050
AAV07750/c
ID AAV0775
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Anchored poly(T) oligonucleotides polyT-anchA (AAT94667), polyT-anchC (AAT94668) and polyT-anchG (AAT94668) are complementary to the upstream region of a polyadenylation sequence. They were used to prime cDNA synthesis from snapdragon (Antirrhinum majus) petal and leaf RNA, and were also utilised in the PCR amplification of plant cytochrome P450 sequences (see also AAT94670-73). A cDNA clone (see AAT94657) encoding flavonoid 3' hydroxylase (see AAW35704) was isolated using a differential display approach. This can be used to manipulate the pigmentation of
                                                                                                             Wang
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18 BP; 1 A; 0 C; 0 G; 17 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Novel flavonoid 3'-hydroxylase(s) from flowering plants - and corresponding DNA, used in the manipulation of pigmentation in plants.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Brugliera F,
                                                                                                                                                                                                                                                                                        misc_difference 1.
                                                                                                                                                                                                                                                                                                                                  Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                              Phosphorothioate oligodeoxynucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                         02-DEC-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         750/c
AAV07750 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Example 15; Page 59; 234pp; English.
                                                 electro-spray ionisation.
                                                           Determining the nucleotide sequence
                                                                                      WPI; 1998-520830/44.
                                                                                                                                                                14-MAR-1997;
                                                                                                                                                                                         12-MAR-1998;
                                                                                                                                                                                                                                          WO9840520-A1
                                                                                                                                                                                                                                                                                                                                                        mass spectrometry; off-resonance excitation;
                                                                                                                                                                                                                                                                                                                                                                       phosphorothioate; electrospray ionisation-Fourier transform;
                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAV07750;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WPI; 1997-448691/41.
                                                                                                                                       (HYBR-) HYBRIDON INC
                                                                                                                                                                                                                    L7-SEP-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (FLOR-) FLORIGENE LTD.
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                                                                                                               BH
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                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry
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                                                                                                                                                                 97US-0040717P.
                                                                                                                                                                                          98WO-US004919.
                                                                                                                                                                                                                                                                                                       Location/Qualifiers
                                                                                                                                                                                                                                                                     note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.5%;
                                                                                                                                                                                                                                                                   "phosphorothioate internucleotide linkages"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Michael MZ;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 14.8;
Pred. No. 1
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                                                              b
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                                                              nucleic
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                                                              acid analyte - using
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Indels
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Example 1; Fig 3A; 25pp; English

The invention relates to an analytical method for determining

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AAV21970
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              nucleotide sequence of nucleic acid analytes, including chemical modified oligonucleotides. This new method utilises electrospray
and formulated with a carrier. A compound comprising this nuclease resistant oligonucleotide can be covalently linked to an antibiotic. The method is used to treat infections by a wide variety of Gram-positive and Gram-negative, or acid-fast, bacteria, in human and veterinary medicine. The methods are particularly used in immuno-compromised individuals (e.g.
                                                                                                                                                                                                                                                                                                                                                                                                                        Claim
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Treating bacterial infections in humans or animals with oligo:nucleotide(s) - resistant to nuclease and targetted to bacterial nucleic acid or proteins, also conjugates of these oligo:nucleotide(s)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  veterinary
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Nuclease resistant; bacterial infection; antibiotic; target;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Nuclease resistant antisense oligo NBT 13 targeted
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      14-JUL-1998
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                                                                                                                                                                                                                This antisense oligonucleotide is nuclease resistant and can be un the treatment of animals, including humans, having a bacterial in. The treatment comprises administration of such nuclease resistant oligonucleotides, targeted to a nucleic acid or protein of the bacterial of th
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 1998-120687/11
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          24-JUL-1996;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   bacterial control; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (OLIG-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               antibiotics.
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                                                                                                                                                                                                                                                                                                                                                                                                                            49; Page 87; 163pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      entry)
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              industrial process;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
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                                                                                                                                                                                                                                                                                                                                                       be used
                                                                                                                                                                                                                             bacterium
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18 445 0;

Matches

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RESULT 2052
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                   Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               chemotherapy or radiation therapy), optionally in combination with, or fused to, antiviral or other antimicrobial oligonuclectides. Apart from therapeutic use, the oligonuclectides can be used to control bacteria in laboratory cultures, foods, beverages and industrial processes. The oligonuclectides are specific for bacteria, without affecting metabolism in mammalian cells. They may also activate RNase H and have a general, non-specific immune-stimulating effect. The oligonuclectides can be administered orally, intranasally, rectally, topically or by injection, optionally coupled to an agent (e.g. carbohydrate or polyamine) that enhances cellular uptake
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequenče
                                                                                                                                    A method has been developed for labelling an oligonuclectide having a repeated sequence of (XY)n (where X and Y consists of a combination of adenine and thymine or uracil or guanine and cytosine, and n is an integer of 1 or more ) at the 3'-terminal side in which the repeated sequence is added and extended using a labelled body of the nucleotide constituting the repeated sequence and a DNA polymerase lacked in 5' to constituting the repeated sequence and a DNA polymerase lacked in 5' to a conscience and a constitution of the constitution of the method can be used for detecting a gene. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   14-JUN-1999
                                                                                                      3' exonuclease activity. The method can be used for detecting a
method can detect a gene in a sensitivity up to ten times higher
prior art methods. The present sequence represents a primer used
                                                                                                                                                                                                                                                       Example 1; Page 7; 10pp; Japanese
                                                                                                                                                                                                                                                                                   Labelling
                                                                                                                                                                                                                                                                                                                   WPI; 1999-257710/22
                                                                                                                                                                                                                                                                                                                                                                                                       10-JUL-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                  23-MAR-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 JP11075880-A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Primer; oligonucleotide; labelling; detection; self-priming;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Primer SEQ ID NO:3 from JP11075880.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAX19943;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAX19943 standard;
                                                                Sequence
                                                                                          example
                                                                                                                                                                                                                                                                                                                                                                           14-JUL-1997;
                                                                                                                                                                                                                                                                                                                                             (KAGA)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 428 TTTTATTTTATTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                                             from
                                                                                                                                                                                                                                                                                                                                             ZH KAGAKU &
                      Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                BP; 0
                                                                                          the present invention
                                                                                                                                                                                                                                                                                      an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (first entry
                                                                                                                                                                                                                                                                                                                                                                           97JP-00205378
                                                                                                                                                                                                                                                                                                                                                                                                       98JP-00195719
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0 A;
                                                                                                                                                                                                                                                                                      oligonucleotide -
                                                              A; 0 C; 0 G; 18 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DNA;
                                                                                                                                                                                                                                                                                                                                              KESSEI RYOHO KENKYUSHO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.5%;
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                     88.9%;
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                                    .5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        G; 18 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       18
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Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Pred.
                        Score 14.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
         Mismatches
                                                                                                                                                                                                                                                                                       useful for detecting
                                                                ou,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             .8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
                         . 8e+03
                                      DB 1;
                                                                 0 Other;
         2;
                                    Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length
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          Indels
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          Gaps
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RESULT 2053
AAX19942/c
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                                                                                                                                                                                                                        RESULT 2054
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                     A method has been developed for labelling an oligonucleotide having a repeated sequence of (XY)n (where X and Y consists of a combination of adenine and thymine or uracil or guanine and cytosine, and n is an integer of 1 or more) at the 3'-terminal side in which the repeated sequence is added and extended using a labelled body of the nucleotide constituting the repeated sequence and a DNA polymerase lacked in 5' to 3' exonuclease activity. The method can be used for detecting a gene. The method can detect a gene in a sensitivity up to ten times higher than prior art methods. The present sequence represents a primer used in an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAX19942 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                     Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 1999-257710/22.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            JP11075880-A.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAX19942;
                                 09-FEB-1999.
                                                       JP11032765-A
                                                                                                                             RT-PCR
                                                                                                                                                    11-MAY-1999
                                                                                                                                                                                                                                                                                                                                                                            example from the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 1; Page 7; 10pp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       14-JUL-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             10-JUL-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Primer; oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Primer SEQ ID NO:2
         18-JUL-1997;
                                                                                                     RT-PCR primer;
                                                                                                                                                                                                  AAX18372 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Labelling of an oligonucleotide - useful for detecting genes
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (KAGA ) ZH KAGAKU & KESSEI RYOHO KENKYUSHO
                                                                                                                                                                                                                                                                                 428
                                                                                                                                                                                                                                                          18
                                                                                                                          primer
                                                                                                                                                                                                                                                                                                         16;
                                                                                                                                                                                                                                                                                                                    Similarity
                                                                                                                                                                                                                                                                                TTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                     BP; 18 A; 0 C; 0 G; 0 T; 0 U;
                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first
                                                                                                                                                   (first entry)
                                                                                                                            of the invention SEQ ID 13.
                                                                                                     DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        97JP-00205378
           97JP-00208312
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             98JP-00195719
                                                                                                     sequence determination;
                                                                                                                                                                                                  DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                from JP11075880.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                 1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         labelling; detection; self-priming; PCR;
                                                                                                                                                                                                  ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP.
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                                                                                                                                                                                                                                                                                                                 Score 14.8; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                              DB 1; Length 18;
                                                                                                                                                                                                                                                                                                                                                     0 Other;
                                                                                                    gene sequence analysis;
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                                                                                                                                                                                                                                                                                                       Gaps
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RESULT 2055
AAZ27846/c
ID AAZ2784
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          This sequence represents a primer of the invention. The invention relates to sequences of at least two nucleotides of formula: (X)m5'-(alpha)n-beta -N3'; or (X)m5'-(gamma)k-Gelta-N3'; where X = a labelled compound and/or a nucleotide with voluntary sequence; m = 0 or 1; alpha = thymine; n = natural number indicating the repetition of alpha; beta, delta = V or N; V = adenine, guanine or cytosine; N = adenine, guanine or thymine; N = adenine, guanine or thymine; and the repetition of gamma = thymine; k = natural number of 3 or over indicating the repetition of gamma, in which thymine expressed by gamma is composed of 1/3 or less of adenine, guanine and/or cytosine. The new nucleotides are useful as primers for RT-PCR and determination of base sequences. The new sequences allow for reproductive and highly efficient analysis of gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Peptides PCR.
                                                                                                                                                                                                                                                                                                                               ITR sequence; pentanucleotide tandem repeat; stutter artifact; DNA typing; DNA profiling; linkage analysis; criminal justice; paternity testing; animal lineage analysis; microsatellite loc
                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAZ27846;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAZ27846 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Page 11; 19pp; Japanese
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            18-JUL-1997;
                                    Isolating DNA containing intermediate tandem repeat sequences, useful in DNA profiling.
                                                                                                                                                                04-FEB-1998;
                                                                                                                                                                                            04-FEB-1999;
                                                                                                                                                                                                                                                                                                                                                                                                     PCR primer for human DNA marker clone S110.
                                                                                                                                                                                                                                                                                                                                                                                                                                  23-DEC-1999
                                                                              WPI; 1999-590696/50
                                                                                                           Schumm
                                                                                                                                                                                                                      12-AUG-1999.
                                                                                                                                                                                                                                                 WO9940194-A1.
                                                                                                                                                                                                                                                                                          Synthetic.
                                                                                                                                                                                                                                                                                                                                                                         Tandem repeat sequence; DNA isolation;
                                                                                                                                                                                                                                                                           domo sapiens.
                                                                                                                                                                                                                                                                                                                    polymorphism
                                                                                                                                      (PROM-) PROMEGA CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            430 TTATTTTATTTTTTTTAA 447
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ) TAKARA SHUZO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  16;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             TTTTTTTTTTTTTAA 18
                                                                                                         Bacher JW;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            97JP-00208312
                                                                                                                                                                98US-00018584
                                                                                                                                                                                            99WO-US002345.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        G; 16 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           new nucleotides - useful as
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                            intermediate tandem repeat;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 .8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length 18;
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Claim 30; Page 22;

111pp; English

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CC containing an intermediate tandem repeat (ITR) sequence using CC hybridization selection, and comprises: (a) providing several DNA CC fragments, at least one of which contains an ITR sequence, a region of CC the DNA fragment which contains at least one repeat unit consisting of a CC sequence of five, six or seven bases repeated in tandem at least two CC times; (b) providing a stationary support having at least one CC oligonuclectide associated with it, where the oligonuclectide includes a CC sequence of nuclectides which is complementary to a portion of the ITR CC sequence; and (c) combining the DNA fragments with the support under CC conditions where the DNA fragments including the DNA fragment containing CC used to isolate DNA containing pentanuclectide tandem repeat sequences as CC well as to detect target ITR DNA sequences having a low incidence of CC stutter artifacts (no more than 2.4%). The method is particularly in CC used to isolate DNA containing pentanucleotide tandem repeat sequences as CC stutter artifacts (no more than 2.4%). The method is useful in DNA CC nyofiling for linkage analyses of the method is useful in DNA containing the DNA fragments method is useful in DNA containing the DNA fragments method is useful in DNA containing the DNA fragments method is useful in DNA containing the DNA fragments method is useful in DNA containing the DNA fragments method is useful in DNA contains and the fragment fragments method is useful in DNA contains the documents method is useful in DNA conta
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AAZ87161/c
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Best Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            This sequence method of the containing an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     profiling for linkage analysis, criminal justice, paternity testing and other forensic and medical uses. DNA typing is also useful for confirming the lineage of horses, dogs and other prize animals. The invention overcomes problems related to the use of microsatellite loci in DNA profiling. The method can detect polymorphisms with a low incidence of stutter artifacts, which has previously been a problem in interpreting allelic content of loci. The development of markers based on larger repeat units, enables easier separation of the fragments on
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Beta-D-arabinose; antisense; reverse transcription; viral
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAZ87161 standard; RNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              electrophoretic gels. This allows the simultaneous analysis of more loci
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Oligoarabinonucleotide SEQ ID NO:2.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           08-MAY-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAZ87161;
WPI; 2000-160584/14.
                                                                                                                                                                                                                                                                                                                                                                                                                                            WO9967378-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   triple helix
                                                                         Damha MJ,
                                                                                                                                                                                                                           19-JUN-1998;
                                                                                                                                                                                                                                                                                                 17-JUN-1999;
                                                                                                                                                                                                                                                                                                                                                                          29-DEC-1999
                                                                                                                                                  (UYMC-) UNIV MCGILL.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        636
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          TCTGTCACCCAGGCTGGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TTTGTCACCCAGACTGGA 1
                                                                         Parniak MA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             BP; 5 A; 4 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   formation; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   is a PCR primer for a human DNA marker clone used in invention. The method is for isolating a fragment of
                                                                                                                                                                                                                       98CA-02241361
                                                                                                                                                                                                                                                                                                 99WO-CA000571.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Location/Qualifiers
1. .18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         /note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     "Ribose moiety replaced by beta-D-arabinose"
                                                                         Noronha
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        653
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  inhibition; transcription; expression;
replication; RNase H cleavage;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                         ¥,
                                                                         Wilds
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                         ú
                                                                             Borkow
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
                                                                         Ģ
                                                                             Arion
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
                                                                             Ö
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           the
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include arabinose sugars, particularly for inhibiting viral replication.
                                                                                  Example 1; Page
                                                                                  29; 91pp; English
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inhibit retroviral replication. The oligoarabinonucleotides can also be used, in combination with RNase H, as reagents for sequence-specific cleavage or RNA mapping, and additionally for the study and control of gene expression in cells. The oligoarabinonucleotides have excellent affinity for RNA, increased resistance to nucleases and show little if any non-specific binding to cellular or serum proteins. They target as RNA, but not complementary ss DNA, so may be useful for targetting retroviral genomic RNA to inhibit the early stages of viral replication. Oligoarabinonucleotides containing pyrimidine bases form triple helices with significantly higher thermal stability than those produced by normal oligoarabinonucleotides. Sequences AAZB7160-ZB7164 represent oligoarabinonucleotides containing beta-D-arabinose used in an exemplification of the present invention oligoarabinonucleotides are used for antisense inhibition of gene expression or to prevent DNA replication, or reverse transcription of RNA by retroviruses. The compositions are therefore particularly used to can hybridise to either a a single-stranded (88) RNA to induce RNAse I cleavage activity, or to a DNA/DNA or DNA/RNA duplex to form a triple helix, thereby inhibiting DNA replication and/or transcription. The The invention relates to a new composition for selective, so specific inhibition of gene transcription and expression in composition comprises oligonuclectides containing arabinose ression in a host. The arabinose sugars that

88888888888888888888888888888888

Sequence 18 BP; 18 A; 0 C; 0 G; 0 T; 0 U; 0 Other;

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RESULT 2057
AAZ87162
                                                                         Matches
                                                                                Query Match
Best Local (
AAZ87162 standard; RNA; 18
                                                       428
                                        18
                                                                         16;
                                                                                  Similarity
                                                 TTTTATTTTATTTTTTT 445
                                         TTTTTTTTTTTTTTTT
                                                                         Conservative
                                                                                 1.5%;
                                                                         0;
                                                                                 Score 14.8;
Pred. No. 1
                                                                          Mismatches
                                                                                 ; DB 1;
L.8e+03;
                                                                          2
                                                                                          Length
                                                                          Indels
                                                                          0
                                                                           Gaps
                                                                           0
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AC CONTRACTOR OF A CONTRACTOR triple helix formation; ss. Beta-D-arabinose; antisense; reverse transcription; viral Oligoarabinonucleotide SEQ ID NO:3. 08-MAY-2000 AAZ87162; (first entry)

inhibition; transcription; expression; replication; RNase H cleavage;

Synthetic

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17-JUN-1999;
                                                          WO9967378-A1
                             29-DEC-1999.
                                                                                                                     modified_base
99WO-CA000571
                                                                                                                                     Location/Qualifiers
                                                                                      /*tag= a
/note= "Ribose moiety replaced by beta-D-arabinose"
                                                                                                                        . 18
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19-JUN-1998; (UYMC-) UNIV MCGILL

WPI; 2000-160584/14 Damha MJ, Parniak MA, Noronha AM, Wilds C, Borkow G, Arion Ď,

Therapeutic composition containing antisense oligonucleotides that

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AAZ87166
ID AAZ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  RESULT 2058
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
Matches 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             inhibit retroviral replication. The oligoarabinonucleotides can also be used, in combination with RNase H, as reagents for sequence-specific cleavage or RNA mapping, and additionally for the study and control of gene expression in cells. The oligoarabinonucleotides have excellent affinity for RNA, increased resistance to nucleases and show little if any non-specific binding to cellular or serum proteins. They target ss RNA, but not complementary ss DNA, so may be useful for targetting retroviral genomic RNA to inhibit the early stages of viral replication. Oligoarabinonucleotides containing pyrimidine bases form triple helices with significantly higher thermal stability than those produced by normal oligonucleotides. Sequences AAZ87160-Z87164 represent oligoarabinonucleotides containing beta-D-arabinose used in an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Therapeutic composition containing antisense oligonucleotides that include arabinose sugars, particularly for inhibiting viral replication.
                                                                                                                                                                                                                                                                                                                                               2'-deoxy-2'-fluoro-beta-D-arabinose; antisense; inhibition; transcription; expression; reverse transcription; viral repRNase H cleavage; triple helix formation; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cleavage activity, or to a DNA/DNA or DNA/RNA duplex to form a triple helix, thereby inhibiting DNA replication and/or transcription. The oligoarabinonucleotides are used for antisense inhibition of gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  composition comprises oligonucleotides containing can hybridise to either a a single-stranded (ss) F
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The invention relates to a new composition for specific inhibition of gene transcription and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 1; Page 29; 91pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 expression or to prevent DNA replication, or reverse transcription of RNA by retroviruses. The compositions are therefore particularly used to
                 Damha MJ,
                                                                                                                                                                               WO9967378-A1
                                                                                                                                                                                                                                                             modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                   Deoxyarabinonucleotide SEQ ID NO:7.
                                                                                                                                                                                                                                                                                                                                                                                                                                                  08-MAY-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AAZ87166;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAZ87166 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    exemplification of the present invention
                                                (UYMC-) UNIV MCGILL.
                                                                                                                 17-JUN-1999;
                                                                                                                                                29-DEC-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   428 TITTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1 OUUUUUUUUUUUUUUUU 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Similarity 0; Conser
               Parniak MA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                   (first entry)
                                                                                98CA-02241361
                                                                                                                 99WO-CA000571
                                                                                                                                                                                                              /note= "Deoxyribose moiety replaced by 2'-deoxy-2'-
fluoro-beta-D-arabinose"
                                                                                                                                                                                                                                               /*tag=
                                                                                                                                                                                                                                                                                Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    A; 0 C; 0 G; 0 T; 18 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0.0%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
                 Noronha AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   new composition for selective,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 14.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   No. 1
                 Wilds
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  .8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1; Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0 Other;
               ú
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   expression in a host.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2;
                 Borkow
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    RNA to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ression in a host. The arabinose sugars that RNA to induce RNase H
                                                                                                                                                                                                                                                                                                                                                                 viral replication;
            ຸດ
               Arion
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0,
               Ö
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      by normal
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RESULT 2059
AAZ87167/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    CC oligoarabinonuclectides are used for antisense inhibition of gene capression or to prevent DNA replication, or reverse transcription of RNA CC by retroviruses. The compositions are therefore particularly used to inhibit retroviral replication. The oligoarabinonuclectides can also be CC used, in combination with RNase H, as reagents for sequence-specific CC cleavage or RNA mapping, and additionally for the study and control of CC gene expression in cells. The oligoarabinonuclectides have excellent CC affinity for RNA, increased resistance to nucleases and show little if CC any non-specific binding to cellular or serum proteins. They target ss CC RNA, but not complementary ss DNA, so may be useful for targetting CC coligoarabinonucleotides containing pyrimidine bases form triple helices CC with significantly higher thermal stability than those produced by normal CC oligonucleotides. Sequences AZEF165-ZEF169 represent CC oligodeoxyarabinonucleotides containing 2'-deoxy-2'fluoro-beta-D-CC arabinose used in an exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    can hybridise to either a a single-stranded (ss) RNA to induce RNase I cleavage activity, or to a DNA/DNA or DNA/RNA duplex to form a triple helix, thereby inhibiting DNA replication and/or transcription. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 18 BP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          specific inhibition of gene transcription and expression in a host. The composition comprises oligonucleotides containing arabinose sugars that
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to a new composition for selective, specific inhibition of gene transcription and expression:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Therapeutic composition containing antisense oligonucleotides that include arabinose sugars, particularly for inhibiting viral replication.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2000-160584/14.
                                                                                                                                                                                                                                                                                                                                                   transcription; expression; reverse transcription; viral replication; RNase H cleavage; triple helix formation; ss.
                                                                                                                                                                                                                                                                                                                                                                                        2'-deoxy-2'-fluoro-beta-D-arabinose; antisense; inhibition;
                                                                                                                                                                                                                                                                                                                                                                                                                          Deoxyarabinonucleotide SEQ ID NO:8.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 08-MAY-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAZ87167;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAZ87167 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Example 2; Page 31; 91pp; English.
                                                                                                                                                                                                                                                      modified_base
                                                                                                                                                                                                                                                                                                                  Synthetic.
                                                    19-JUN-1998;
                                                                                                                             29-DEC-1999.
                                                                                                                                                              409967378-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          428 TTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                      98CA-02241361
                                                                                        99WO-CA000571.
                                                                                                                                                                                                  /*tag= a
/note= "Deoxyribose moiety replaced by 2'-deoxy-2'-
fluoro-beta-D-arabinose"
                                                                                                                                                                                                                                   /*tag=
                                                                                                                                                                                                                                                                          Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            88.9%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          <u>.</u>.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 14.8; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  sequence-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gaps
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(UYMC-) UNIV MCGILL

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RESULT 2060
AAZ48898/c
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 used, in combination with RNase H, as reagents for sequence-specific cleavage or RNA mapping, and additionally for the study and control of gene expression in cells. The oligoarabinonucleotides have excellent affinity for RNA, increased resistance to nucleases and show little if any non-specific binding to cellular or serum proteins. They target ss RNA, but not complementary ss DNA, so may be useful for targetting retroviral genomic RNA to inhibit the early stages of viral replication. Oligoarabinonucleotides containing pyrimidine bases form triple helices with significantly higher thermal stability than those produced by normal oligonucleotides. Sequences AAS07165-Z87169 represent oligodeoxyarabinonucleotides containing 2'-deoxy-2'fluoro-beta-D-arabinose used in an exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 specific inhibition of gene transcription and expression in a host. The composition comprises oligonucleotides containing arabinose sugars that can hybridise to either a a single-stranded (ss) RNA to induce RNase to cleavage activity, or to a DNA/DNA or DNA/RNA duplex to form a triple helix, thereby inhibiting DNA replication and/or transcription. The oligoarabinonucleotides are used for antisense inhibition of gene oligoarabinonucleotides are used for antisense inhibition of gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  expression or to prevent DNA replication, or reverse transcription of RNA by retroviruses. The compositions are therefore particularly used to inhibit retroviral replication. The oligoarabinonucleotides can also be
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Therapeutic composition containing antisense oligonucleotides that include arabinose sugars, particularly for inhibiting viral replication
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Damha MJ,
                                                                                                                                                                                                                                                                                                                                                                                         Antisense inhibitor; human; ICAM-1; intercellular adhesion molecule-1; vascular cell adhesion molecule-1; hyperproliferative disorder; VCAM-1; endothelial leukocyte adhesion molecule-1; ELAM-1; skin condition; cancer; viral infection; tumour; diapedesis; graft versus host disease; arthritis; infection; autoimmune disorder; multiple sclerosis; stroke; juvenile diabetes mellitus; arthritis; myasthenia gravis; therapy; pemphigus vulgaris; systemic lupus erythematosus; acute myocarditis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention relates to a new composition for selective,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2000-160584/14.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        29-MAR-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAZ48898
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAZ48898 standard; DNA; 18
27-MAY-1998;
                                                                  26-MAY-1999;
                                                                                                                                    02-DEC-1999
                                                                                                                                                                                                                                                              Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                cardiovascular disorder; dilated
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            428
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            TTTTATTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Parniak MA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  antisense inhibitor, ISIS #1564.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                  99WO-US011548.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            A; 0 C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Noronha AM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Wilds C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1; Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Borkow
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Ó
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Sequence 18

BP; 4 A; 1 C; 11 G; 2 T; 0 U; 0 Other;

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condition e.g. inflammatory bowel disease such as Crohn's disease.

Colitis or ulcerative colitis, a condition of the skin, e.g. psoriasis or

Cytotoxic dermatitis, rheumatoid arthritis, allograft rejection, cancer,

Cytotoxic dermatitis, rheumatoid arthritis, allograft rejection, cancer,

Cytotoxic dermatitis, rheumatoid arthritis, allograft rejection, cancer,

Cytotoxic dermatitis, rheumatoid arthritis, allograft verjection, cancer,

Creducing wiltiple sclerosis or a viral infection. The ICAM-1 sequences

Creducing cyclosporine use in a patient. The oligonucleotides can also be

used for detection and diagnosis. They can also be used for treating e.g.

Cytotoxic disease, arthritis, infections, autoimmune disorders, e.g. autoimmune

Cytotoxic disease, arthritis, infections, autoimmune disorders, e.g. autoimmune

Cytotoxic disorders, autoimmune forms of arthritis, multiple sclerosis,

Cytotoxic disorders, autoimmune forms of arthritis, multiple sclerosis,

Cytotoxic dermatischeria gravis, pemphigus

Cytotoxic dermatischeria gravis dermatischeria gravis, pemphigus

Cytotoxic dermatischeria gravis dermatisc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     antisense oligonucleotides are targeted to a nucleic acid encoding a cellular adhesion molecule (2AM) and is capable of modulating the expression of the CAM. They particularly inhibit intercellular adhesion molecule-1 (ICAM-1), vascular cell adhesion molecule-1 (VCAM-1), or endothelial leukocyte adhesion molecule-1 (ELAM-1). The antisense oligonucleotides can be used to modulate CAM activity in mediating cell:cell interactions and subsequent cellular and biological responses, e.g. T cell activation, leukocyte transmigration and inflammation. The antisense sequences can be used for modulating the synthesis of a CAM. They can be used for treating an animal suspected of having or being prome to a disease or condition associated with a CAM. Oligonucleotides targeted to ICAM-1 can be used for treating an inflammatory disease or condition associated with a CAM. Oligonucleotides
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New antisense oligonuclectides, used for treating e.g. inflammatory conditions, psoriasis, graft rejection, cancers, infections, cardiovascular disorders or autoimmune disorders.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 10; Page 174; 199pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ç
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                                                                                                                                                                                              RESULT 2061
AAC60960/c
                                                                                                                                                                                                                                                                              Matches
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                                                                                  Short tandem repeat; primer; STR; susceptibility; HIV; i detection; polymorphism; interleukin 10 promoter; IL-10; chromosome position 4q12; group-specific component; ss.
                                                                                                                          Group-specific component short tandem repeat primer SEQ ID NO:20
                                               WO200061811-A2
                                                                  Homo sapiens.
                                                                                                                                               13-FEB-2001
                                                                                                                                                                                      AAC60960 standard; DNA; 18
                                                                                                                                                                                                                                                                                        Local
                                                                                                                                                                                                                                                          533 TCCTCCTGCCTCAGCCTC
                                                                                                                                                                                                                                      18
                                                                                                                                                                                                                                                                             1 Similarity
16; Conserv
                                                                                                                                                                                                                                        TCCTCCCACCTCAGCCTC 1
                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                        88.9%;
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                                                                                                                                                                                                                                                                                        Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                        .8e+03;
                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                 Length 18;
                                                                                                                                                                                                                                                                                 Indels
                                                                                                          infection;
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                                                                                                          AIDS;
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06-APR-2000; 2000WO-US009355

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AAD03565
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RESULT 2062
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The present invention describes a method for predicting susceptibility to C HIV infection or HIV progression in a subject. The method involves detecting a polymorphism in a human interleukin-10 (LI-10) promoter, where the presence of the polymorphism indicates susceptibility to HIV infection or HIV progression. The method provides prognostic information to persons infected with HIV virus and is useful to help select treatments (such as administration of IL-10 or gene therapy with IL-10). The presence of polymorphism is useful as predictor that very aggressive treatment could substantially eradicate the virus from the infected person. The method is useful for the generation of normograms or other predictive algorithms that can be used, in association with allele status, to prognose probable survival or years to development of AIDS following HIV serconversion. It indicates that increased expression of the IL-10 gene helps to reduce HIV-1 infection and pathogenic progression and enables a variety of new therapeutic interventions in the treatment of HIV disease. The present sequence represents a short tandem repeat (STR) primer which is used in an example from the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
Best Local S
                                                                                                                                                                                                                                         antidiabetic; immunosuppressive; antiasthmatic; antirheumatoid; antibacterial; osteopathic; cerebroprotective; vasotropic; antiblcer; nootropic; neuroprotective; congestive heart failure; myocarditis; hypertrophic cardiomyopathy; angina pectoris; myocardial infarction; kidney disease; acute renal failure; renal glucosuria; renal infarction; polycystic kidney disease; hereditary nephritis; inflammatory disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Predicting susceptibility to HIV infection or progression useful for selection of therapeutic treatment for persons infected with HIV virus, comprises detecting polymorphism in human interleukin-10 promoter.
                                                                                                                                                                             tumour angiogenesis; osteoarthritis; toxic shock syndrome; psoriasis; stroke; neural trauma; cerebral malaria; Crohn's disease; osteoporosis; ulcerative colitis; Alzheimer's disease; gene therapy; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             09-APR-1999;
                                                                                                                                                                                                                                                                                                                                                                   Rat; secreted factor; clone P00188_D12; cardiant; antiinflammatory; antiarrhythmic; antiarteriosclerotic; antiatherosclerotic; nephropathic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           AAD03565 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 1; Page 11; 40pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2000-687051/67
              27-SEP-2000; 2000WO-US026544.
                                                         05-APR-2001.
                                                                                                                                        Rattus norvegicus
                                                                                                                                                                                                                                                                                                                                                                                                                                 Oligonucleotide #6 used for the preparation of normalised cDNA libraries
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19-JUN-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 18 BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (USSH ) US
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   737 GGACTACAGGCGCCCACC 754
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    DEPT HEALTH & HUMAN SERVICES
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           5 C; 6 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              <u>.</u>.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
..8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 18,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0
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protein designing;

88.

Unidentified.

misc_feature

/*tag=

"Linked to (PEG) 2CCPuromycin"

Location/Qualifiers

28-FEB-2001; 2001WO-US006414

07-SEP-2001.

WO200164942-A1

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RESULT 2063
AAD17014/c
ID AAD17014 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            hypertrophic cardiomyopathy, angina pectoris, myocardial infarction, cardiac arrhythmia, arteriosclerosis, kidney diseases such as acute renal failure, renal glucosuria, renal infarction, nephrogenic diabetes cardiare, renal glucosuria, renal infarction, nephrogenic diabetes. Consipidus, polycystic kidney disease, hereditary nephritis and inflammatory diseases such as asthma, autoimmune diabetes, tumour angiogenesis, rheumatoid artritis, osteoarthritis, toxic shock syndrome, asthma, stroke, neural trauma, psoriasis, cerebral malaria, osteoporosis, crohn's disease, ulcerative colitis, Alzheimer's disease. Secreted protein DNA is useful in antisense-mediated gene inhibition and in gene therapy. An array comprising one or more oligonucleotides complementary to reference RNA or DNA encoding the secreted factor is useful for detecting cardiac, kidney and inflammatory disease. The present DNA sequence is an oligonucleotide which is used in the preparation of a normalised cDNA library containing secreted factor DNAs. The normalised cDNA libraries are used in the identification of differentially expressed rat secreted factor p0018_D12 gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The patent discloses novel secreted factor protein encoded by clone pools plants. The secreted factor is differentially expressed in certain disease states. Secreted protein, its antibodies, antagonists or compositions comprising them are useful in the diagnosis and treatment of cardiac diseases such as congestive heart failure, myocarditis, bungletten the cardiac contents of the cardiac diseases such as congestive heart failure.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Novel secreted factor encoded by clone P00188D12 which is expressed in certain disease states, useful in diagnosing cardiac, renal or inflammatory diseases.
                                                                                                                                                                                                                                                        Scaffold protein; antibody mimic; fibronectin type randomised loop; randomised beta-sheet; diagnostic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 18 BP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2001-266159/27.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Stanton LW, Kapoun
                                                                                                                                                                                                                                                                                                              Oligonucleotide A18-2PEG linker.
                                                                                                                                                                                                                                                                                                                                                  29-NOV-2001 (first entry
                                                                                                                                                                                                                                                                                                                                                                                       AAD17014;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Example 1; Page 42; 71pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          428
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          TTTTATTTTATTTTTTT 445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 14.8;
Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length 18;
                                                                                                                                                                                                                                                       : III domain;
: purpose;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     differentially and treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Gaps
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AAF99708
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local :
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Matches 16; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention relates to an array of proteins (antibody mimics) comprising a fibronectin type III domain having a randomised loop, a randomised beta-sheet, or their combination, and has the capacity to bin to a compound that is not bound by a corresponding naturally-occurring fibronectin, immobilised onto a solid support. The antibody mimics is useful for detecting a compound preferably a protein, in a biological sample. It is also useful to detect one or more different analytes simultaneously in a sample. Hence is useful for diagnostic purposes. It is also useful for the purpose of designing proteins capable of binding to virtually any compound of interest. The present sequence is an oligonucleotide A18-2PBG linker used in an exemplification of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Fibronectin scaffold protein array for obtaining a protein/compound which binds to a compound/protein, comprises a fibronectin type III domain having a randomized loop, a randomized beta-sheet or their combination.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Vaccine; cytostatic; virucidal; bactericidal; fungicidal; immunostimulatory; tumour; viral infection; bacterial infection; parasitic infection; cancer; asthma; infectious disease; allergy; immune deficiency; phosphorot
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (PHYL-) PHYLOS INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             29-FEB-2000; 2000US-00515260
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Synthetic
                      WPI; 2001-273485/28.
                                                                                                                                                                                                                                                                                                                      25-SEP-2000; 2000WO-US026383.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Immunostimulatory nucleic acid
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                                                                                                                              (IOWA )
                                                                                                                                                                                                                23-AUG-2000;
                                                                                                                                                                                                                                          25-SEP-1999;
27-SEP-1999;
                                                                                                                                                                                                                                                                                                                                                                              05-APR-2001.
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                                                                            Krieg
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   428
                                                                            ΑM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   18
                                                                                                                                                             UNIV IOWA RES FOUND
                                                                                                                                    COLEY
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              standard; DNA; 18
                                                                            Schetter C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Page 25; 67pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
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                                                                                                                                                                                                                2000US-0227436P
                                                                                                                                    PHARM GMBH.
                                                                                                                                                                                                                                          99US-0156113P.
99US-0156135P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0 C;
                                                                              Vollmer J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Kuimelis
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    infection;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           anti-parasitic;
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Victinating against tumors, infectious diseases, allergies using immunostimulatory Py-rich and TG nucleic acids.
                                                                                                    and asthma
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Claim 101; Page 56; 338pp; English.

against tumour antigens, viral antigens (e.g. herpesviridae, retrovirid and/or orthomyxoviridae), bacterial antigens (e.g. toxoplasma, haemophilus, campylobacter, clostridium, Escherichia coli and/or staphylococcus), fungal antigens and/or parasitic antigens. The method also useful for preventing cancer, asthma, infectious disease, allergy immune deficiency. The present sequence can also be used to redirect a Th2 to a Th1 immune response and to activate immune cells. Note: the response. The method comprises administering an immunostimulatory nucleic acid to a non-rodent subject in sufficient quantity to stimulate an immune response. The present sequence is one such immunostimulatory nucleic acid. The immunostimulatory nucleic acid. The immunostimulatory nucleic acids can be pyrimidine rich (py-rich) or thymidine (T) rich. The method is used to vaccinate subjects against tumour antigens, viral antigens (e.g. herpesviridae, retroviridae) present sequence may have a phosphorothioate backbone invention relates to a method for stimulating an immune or

18 ВP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other;

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                                   Query Match
Best Local S
                             Matches
              428
                            l Similarity
16; Conserv
         TTTTATTTATTTTTTT
                             Conservative
                                     88.9%;
18
              445
                             0;
                                     Score 14.8;
Pred. No. 1
                               Mismatches
                                     DB 1;
..8e+03;
                                           Length
                               Indels
                               0;
                               Gaps
                                0
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RESULT 2065
AAF99734
                                                               AAF99734 standard; DNA; 18
                                                         12-JUN-2001
                                                         (first entry)
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Immunostimulatory nucleic acid #850

infectious disease; allergy; immune deficiency; phosphorothioate; fungal infection; Vaccine; cytostatic; virucidal; bactericidal; fungicidal; anti-parasitic; immunostimulatory; tumour; viral infection; bacterial infection; parasitic infection; cancer; asthma;

Synthetic

05-APR-2001

WO200122972-A2

25-SEP-2000; 2000WO-US026383

25-SEP-1999; 27-SEP-1999; 23-AUG-2000; (IOWA) UNIV IOWA RES FOUND. (COLE-) COLEY PHARM GMBH. 99US-0156113P. 99US-0156135P. 2000US-0227436P.

Krieg AM, Schetter C, Vollmer Ç,

WPI; 2001-273485/28.

Vaccinating against tumors, infectious diseases, allergies using immunostimulatory Py-rich and TG nucleic acids. and asthma

Claim 101; Page 56; 338pp; English

The present invention relates to a method for stimulating an immune response. The method comprises administering an immunostimulatory nucleic acid to a non-rodent subject in sufficient quantity to stimulate an

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RESULT 2066
AAF82472
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Best Local
The present sequence corresponds to polylinker DNA of the phagemid vector pCR2.1. It was used in the construction of a normalised rat CNNA library, which was used in an example demonstrating differential expression of a rat gene referred to as clone P00210D09. The invention relates to a polypeptide comprising a sequence of at least 80% identity to residues 22 -122 of the present sequence, or a sequence encoded by a nucleic acid hybridsing under stringent conditions to the complement of the coding region comprising 1031 nucleotides, and having at least one biological activity of the polypeptide encoded by clone P00210D09. The polypeptides and polymucleotides of the invention are useful for the treatment of cardiac, renal and inflammatory diseases. The polymucleotides are useful in assays for identifying lead compounds that may be used as therapeutic agents in the treatment of cardiac, kidney or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        nucleic acid. The immunostimulatory nucleic acids can be pyrimidine rich (py-rich) or thymidine (T) rich. The method is used to vaccinate subjects against tumour antigens, viral antigens (e.g. herpesviridae, retroviridae and/or orthomyxoviridae), bacterial antigens (e.g. toxoplasma, haemophilus, campylobacter, clostridium, Escherichia coli and/or staphylococcus), fungal antigens and/or parasitic antigens. The method is also useful for preventing cancer, asthma, infectious disease, allergy or immune deficiency. The present sequence can also be used to redirect a Th2 to a Th1 immune response and to activate immune cells. Note: the present sequence may have a phosphorothioate backbone
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Phagemid vector; pCR2.1; rat; secreted factor; P00210D09; cardiant; nephrotropic; antiinflammatory; gene therapy; cardiac disease; renal disease; inflammatory disease; polylinker; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel secreted factor encoded by clone P00210D09 useful for diagnosing treating and/or preventing various cardiac, renal and inflammatory
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 1; Page 41; 69pp; English.
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Pred. No. 1.
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AAH4050: ID AAI XX

AAH40502 standard;

DNA; 18

RESULT 2068

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AAF16625
ID AAF1
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Best Local S
Matches 16
                                             Query Match
Best Local S
Matches 16
                                                                                                                The present invention provides oligonucleotides, and methods for their use, which are useful in modulating the action of proteins involved in gastric acid production. The target protein is preferably the histamine H2 receptor or one of the proteins which form part of the gastric proton pump. The sequences and methods of the invention are useful in the treatment of gastric reflux, gastritis, dyspepsia, stomach ulcers, duodenal ulcers and other gastric acid disturbances, most of which are caused by Helicobacter pylori
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 18 BP; 0
                                                                                                                                                                                                                                                 Treating gastric acid disturbance which modulates the activity of a production or secretion.
                                                                                                                                                                                                                                                                                                                                                                                                                      30-NOV-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA-RNA hybrid;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gastric acid disturbance; gastric reflux;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Gastric acid production inhibiting oligonucleotide SEQ ID NO:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAF16625;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAF16625 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              inflammatory diseases
                                                                                           Sequence 18
                                                                                                                                                                                                                            Example 3; Page 151; 164pp; English.
                                                                                                                                                                                                                                                                                                  WPI; 2001-025093/03.
                                                                                                                                                                                                                                                                                                                         Tachas
                                                                                                                                                                                                                                                                                                                                                                         24-MAY-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        stomach ulcer; duodenal ulcer; Helicobacter pylori; antisense;
                                                                                                                                                                                                                                                                                                                                                 (TACH/) TACHAS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          428 TTTTATTTTATTTTTTTT
                       777 TTTTTAGTAGAGATGGGG 794
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           _
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      l Similarity
16; Conserv
                                                          Similarity
TTTTTAGTAGAGACAGGG
                                                                                           BP; 5 A; 1 C; 6 G; 6 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                               Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
                                                                                                                                                                                                                                                                                                                                                 Q
                                                                                                                                                                                                                                                                                                                                                                         99AU-00000510
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            88.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
                                                         1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0;
 18
                                               0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       G; 18 T; 0 U;
                                                          Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
                                                Mismatches
                                                                                                                                                                                                                                                               by administering an oligonucleotide polypeptide involved in gastric acid
                                                                                              0
U,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.8e+03
                                                           1.8e+03;
                                                                                              0 Other;
                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    gastritis; dyspepsia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0 Other;
                                                                     Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 18
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                                                Gaps
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Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide CC primer extension (SNPE) primers, and the sequences of regions flanking CC sites of single nucleotide polymorphisms SNPs. The present invention CC includes kits for determining the presence of a SNP, using the CC oligonucleotides of the invention. The PCR primers are used to amplify a CC SNP flanking sequence, the SNPE primer is used as a genotyping primer. CC The oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The CC oligonucleotides are useful for determining the presence, absence or CC identity of a SNP and for genotyping nucleic acid sample by consists by association analysis the genotype of an individual or group of CC assess by association analysis the genotype of an individual or group of CC individuals, having a pathological phenotypic trait suspected of being CC aused by one or more SNPs. Phenotypic trait is include diseases e.g. CC osteogenesis imperfects and acute intermittent porphyria. Phenotypic CC traits also include symptoms of or susceptibility to multifactorial CC disease of which a component is or may be genetic such as autoimune cliseases, including, rheumatoid arthritis, multiple sclerosis, include control of the present sequence and infection by pathogenic control of the method is also useful in forensic investigations and conternity analysis. The method is also useful in forensic investigations and conternity analysis. The present sequence represents a PCR primer specific content in the present sequence contents and contents of the pr
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                                         S
                                                                                          Matches
                                                                                                               Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; s
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    14-AUG-2001
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 1; Page 66; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               13-OCT-2000; 2000WO-US028436.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                26-APR-2001.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WO200129262-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SNPE; genotyping; agammaglobulinaemia; dia
Lesch-Nyhan syndrome; muscular dystrophy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Single nucleotide polymorphism; SNP; single nucleotide primer extension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (ORCH-) ORCHID BIOSCIENCES INC
                                                                                                                                                                                    Sequence 18 BP; 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      specific lower PCR primer SEQ ID
                                           685
                                                                                          16;
_
                                                                                                                  Similarity
                                              CTCTGCCTCCCGGGTTCA 702
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   99US-0160096P.
                                                                                                                                                                                                                               containing
                                                                                                                                                                                    A; 9 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                               88.9%;
                                                                                                                                                                                                                                  DNA sequence
  18
                                                                                          0;
                                                                                                               Score 14.8;
Pred. No. 1.
                                                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        3298.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          diabetes insipidus; cancer;
ny; familial hypercholesterolaemia;
                                                                                                                  1.8e+03
                                                                                                                                        DB 1;
                                                                                                                                     Length 18;
                                                                                            Indels
                                                                                          0
                                                                                            Gaps
                                                                                            0
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RESULT 2069 AAH38362 ID AAH3836

AAH38362 standard; DNA; 18

ВP

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0,

RESULT 2070 AAH40562/c

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Craire strain (NURE) primers, and the sequences of regions flanking concludes kits for determining the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a CR SNP flanking sequence, the SNPE primer is used as genotyping primer. CR The oligonucleotides of the invention. The PCR primers are used to amplify a CR SNP flanking sequence, the SNPE primer is used as genotyping primer. CR criming a single-nucleotide primer extension reaction. The CR oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The CR oligonucleotides are useful for determining the presence, absence or CR identity of a SNP and for genotyping nucleic acid samples, for e.g. to CR assess by association analysis the genotype of an individual or group of craits speciation analysis the genotype of an individual or group of craits include diseases e.g. CR agammaglobulinaemia, diabetes insipidus, Lesch-Nyhan syndrome, muscular CR disease of which a component is or may be genetic such as autoimmune CR disease of which a component is or may be genetic such as autoimmune CR disease, including, rheumatoid arthritis, multiple sclerosis, criminamation, cancer, nervous system diseases and infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic confirmation and processed and processed and pathogenic and component is also useful in forensic investigations and component sequence represents a PCR primer specific for a human syndrome.
                                                                                                                                          Matches
                                                                                                                                                                                                 Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              polycystic kidney disease; osteogenesis imperfecta; autoimmune disease; acute intermittent porphyria; rheumatoid arthritis; multiple sclerosis; inflammation; forensic investigation; paternity analysis; PCR primer; s
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Single nucleotide polymorphism; SNP; single nucleotide primer extension;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            14-AUG-2001
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    13-OCT-2000; 2000WO-US028436
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Lesch-Nyhan
                                                                                                                                                                                                                                                                          Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 1; Page 55; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (ORCH-) ORCHID BIOSCIENCES INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              15-OCT-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WO200129262-A2
                                                                 836 TGATCTGCCTGCCTCGGC
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\mathbf{\mu}
                                                                                                                                          16;
                                                                                                                                                                           Similarity
   TGATCTGCCCACCTCGGC
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syndrome; muscular dystrophy; familial hypercholesterolaemia;
                                                                                                                                                                                                                                                                              BP;
                                                                                                                                                                                                                                                                                                                                                SNP containing DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       lower PCR
                                                                                                                                          Conservative
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                                                                                                                                                                                                                                                                              N
                                                                                                                                                                                                                                                                              P.
                                                                                                                                                                    1.5%;
                                                                                                                                                                                                                                                                              8 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       primer SEQ ID
                                                                     853
                                                                                                                                       0;
                                                                                                                                                                           Pred.
                                                                                                                                                                                                     Score 14.8;
                                                                                                                                              Mismatches
                                                                                                                                                                           No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1158
                                                                                                                                                                           1.8e+03;
                                                                                                                                                                                                                DB 1;
                                                                                                                                                                                                        Length 18;
                                                                                                                                              Indels
                                                                                                                                              0
                                                                                                                                              Gaps
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                                                                                                                                                                                                                                                                                                                                                                                                                                includes kits for determining the presence or absence of a SNP, using the coligonuclectides of the invention. The PCR primers are used to amplify a SNP flanking sequence, the SNPE primer is used as a genotyping primer. The oligonuclectides are useful for genotyping a nucleic acid sample by performing a single-nuclectide primer extension reaction. The oligonuclectides are useful for determining the presence, absence or cligonucleotides are useful for determining the presence, absence or cligonucleotides are useful for genotyping nucleic acid samples, for e.g. to assess by association analysis the genotype of an individual or group of individuals, having a pathological phenotypic trait suspected of being caused by one or more SNPs. Phenotypic traits include disease e.g. dystrophy, familial hypercholesterolaemia, polycystic kidney disease, dystrophy, familial hypercholesterolaemia, polycystic kidney disease, of traits also include symptoms of or susceptibility to multifactorial disease of which a component is or may be genetic such as autoimmune diseases, including, rheumatoid arthritis, multiple sclerosis,
                                                                                                                       Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                              microorganism. The method is also useful paternity analysis. The present sequence for a human SNP containing DNA sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide primer extension (SNPE) primers, and the sequences of regions flanking sites of single nucleotide polymorphisms SNPS. The present invention
                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
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                                                                                                                                                                                                                                                                                                                                                                diseases, including, rneumacolu atcoller, marine infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic inflammation, cancer, nervous system diseases and infection by pathogenic infection infection by pathogenic infection infection by pathogenic infec
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 1; Page 67; 83pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   13-OCT-2000; 2000WO-US028436.
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Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Single nucleotide polymorphism; SNP; single nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SNP specific lower PCR primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 14-AUG-2001
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (ORCH-) ORCHID BIOSCIENCES INC.
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                                                           394 GCTGGGATTACAGGCGTG
18
                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                   B₽;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first entry)
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                                                                                                                                                                                                                                                      w
                                                                                                                                                                                                                                                      A;
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                                                                                                                                                     1.5%;
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                                                           411
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                                                                                                                           0
                                                                                                                                                         Pred.
                                                                                                                                                                                Score 14.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SEQ ID
                                                                                                                                                                                                                                                   4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                            sequence represents
                                                                                                                                                     No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  3358.
                                                                                                                                                         1.8e+03
                                                                                                                                                                                   DB 1; Length 18;
                                                                                                                                                                                                                                                                                                                                                   a PCR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  primer extension;
                                                                                                                                                                                                                                                                                                                                                primer
                                                                                                                       0
                                                                                                                       Gaps
                                                                                                                    0;
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RESULT 2071

S 밁

249

TCGGCCTCCCAAAGTGCT

266

18

Query Match Best Local S Matches 16

Local Similarity

1.5%;

16;

Conservative

0;

Mismatches

Pred. No. Score 14.8;

.8e+03

В ۲.

Length 18;

<u>0</u>

Gaps

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AAH38461
AAH38461
XX
AAC
AAH3
AC
AAH3

                                                                                                                                                                                           CC primer extension (SNPE) primers, and the sequences of regions flanking controlled the present invention controlled the presence or absence of a SNP, using the coligonucleotides of the invention. The PCR primers are used to amplify a CR SNP flanking sequence, the SNPE primer is used as a genotyping primer. CR The oligonucleotides are useful for genotyping a nucleic acid sample by performing a single-nucleotide primer extension reaction. The CR primers by association analysis the genotyping and for e.g. to complete the sneed of a single-nucleotide primer extension reaction. The CR cindividuals, having a pathological phenotypic trait suspected of being cassess by association analysis the genotypic trait suspected of being cassed by one or more SNPs. Phenotypic trait suspected of being cassed by one or more SNPs. Phenotypic traits include diseases e.g. co of teogenesis imperfecta and acute intermittent porphyria. Phenotypic traits also include symptoms of or susceptibility to multifactorial controlled symptoms of or susceptibility to multifactorial conformation. Cannor nervone extension and issaes and inferior hyperthonesis, including, rheumatoid arthritis, multiple sclerosis, traits cannor in carnor nervone extensions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Single nucleotide polymorphism; SNP; single nucleotide primer extension; SNPE; genotyping; agammaglobulinaemia; diabetes insipidus; cancer; Lesch-Nyhan syndrome; muscular dystrophy; familial hypercholesterolaemia;
   Sequence
                                                                                                      inflammation, cancer, nervous system diseases and infection by pathogenic microorganism. The method is also useful in forensic investigations and paternity analysis. The present sequence represents a PCR primer specific
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 1; Page 56; 83pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New genotyping oligonucleotide, useful for detecting the presence, absence or identity of single polynucleotide polymorphism in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SNP specific upper PCR primer SEQ ID 1257.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAH38461;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequences AAH37205 - AAH40944 represent PCR primers, single nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Picoult-Newburg L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 15-OCT-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                13-OCT-2000; 2000WO-US028436
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     26-APR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WO200129262-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                14-AUG-2001
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                                                                         for a human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (ORCH-) ORCHID BIOSCIENCES INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  intermittent porphyria, rheumatoid arthritis, multiple sclerosis; mation; forensic investigation; paternity analysis; PCR primer: 8
   18
BP;
                                                                         SNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
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   2 A;
                                                                         containing
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6 C;
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                                                                             DNA
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   Ċ.
   5 T;
                                                                         sequence
   0 U;
0 Other;
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RESULT 2072
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                                                                                                                                The present sequence is that of DNA-RNA-DNA hybrid oligonucleotide CC AGT02013. This is one of a set of oligonucleotides (see ABA91527-30) used CC to assess the minimum number of ribonucleotides in DNA-RNA chimeric CC oligonucleotides required for RNase H cleavage. Each oligonucleotide of CC The oligonucleotides were mixed with target DNA oligonucleotide AGT02009 (see ABA91531) and incubated with RNase H (5 U/ml) at 37 degrees C for 30 (minutes. The results showed that 4 ribonucleotides were mixed the minimum CC number for RNA cleavage. The invention provides probes for nucleic acid Chybridisation. The probes form a hairpin structure comprising a double-stranded stem and a single-stranded loop, and are capable of both CC intramolecular and intermolecular hybridisation. The double-stranded stem CC RNase H cleavage. When the probe hybridises with a target DNA, the RNA CC RNase H cleavage when the probe sensitive to RNase H treatment and CC can be removed. Arrays and methods for nucleic acid hybridisation using C the probes are provided
                                                     Matches
                                                                 Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                         probes for detecting target nucleotide sequence in sample, has sequence that forms hairpin structure having a double-stranded segment and singlestranded loop collectively forming region complementary to target
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      14-JUL-2000; 2000US-00616761
30-MAR-2001; 2001US-00823647
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNA-RNA-DNA oligonucleotide AGT02013 used to test RNase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                23-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ABA91529;
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                                                                                                                                                                                                                                                                                                                                                                                                  Example 4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2002-171819/22.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Dattagupta N;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  12-JUL-2001; 2001WO-US022166
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA-RNA hybrid;
                                                                                                           Sequence 18 BP; 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (GENE-) APPLIED
                          668
                                                     16;
Н
                          TATTTTAATTTTTGTTT
                                                                                                                                                                                                                                                                                                                                                                                                  Page 49; 72pp;
                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (first
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/label= RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Location/Qualifiers
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                                                                                                           A; 0 C; 0
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                                                                 1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              TECHNOLOGIES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         H; nucleic acid detection;
                                                                                                                                                                                                                                                                                                                                                                                                  English.
                         916
18
                                                     0,
                                                                                                             G; 16 T; 0 U;
                                                                 Score 14.8;
Pred. No. 1.
                                                       Mismatches
                                                                   1.8e+03
                                                                                  DB 1;
                                                                                                             0 Other;
                                                                               Length 18;
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                                                     Gaps
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AAD38323/c ID AAD38: RESULT 2073

AAD38323 standard; DNA; 18

Human, secretory leukoprotease inhibitor; SLPI; cystatin A; CSTA; SCCE; stratum corneum chymotryptic enzyme; stratum corneum tryptic enzyme; PCR; adhesion protein; protease; protease inhibitor; eczema; primar; SCTE;

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        CC The present invention relates to a method for analysing microsatellite CC loci. The method involves coamplifying a set of 3 microsatellite loci. CC comprising a specific mononucleotide repeat locus selected from the group CC consisting of BAT-25, BAT-26, BAT-40, MONO-11 and MONO-15 and two CC tetranucleotide repeat loci selected from FGA, DIS518, DI7S1299 etc from CC asample of genomic DNA and determining the size of the amplified CC fragments. The method is useful for analysing microsatellite loci and for CC detecting microsatellite instability (MSI) in genomic DNA. The CC instability in the set of microsatellite loci are used in prognostic CC tumour diagnosis for the diagnosis of familial tumour predisposition. It is also used to detect cancerous tumours in the gastrointestinal system CC and of the endometrium. The cancerous tumours are preferably from a CC colorectal cancer. The present DNA sequence is a PCR primer which is used CC exemplifying human MONO-15 locus. This primer is used in the
RESULT 2074
ABK86369
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Analyzing microsatellite loci for detecting microsatellite instability that can be used for prognostic tumor diagnosis, comprises coamplifying mononucleotide repeat locus and two tetranucleotide repeat loci.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           10-SEP-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     24-APR-2001; 2001US-00841366.
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                                                                                       Secretory leukoprotease inhibitor (SLPI) PCR primer #1.
                                                                                                                                                                                            ABK86369;
                                                                                                                                                                                                                                          ABK86369
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 4; Page 17; 48pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-SEP-2000; 2000US-00663020
                                                                                                                                           07-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                  674 CTCACTGCAACCTCTGCC 691
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                                                                                                                                                                                                                                                                                                                                                                   18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                      CTCACTGCAAGCTCCGCC 1
                                                                                                                                                                                                                                             standard; DNA; 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 3 A; 3 C; 9 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Conservative
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                                                                                                                                           (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
88.9%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Nassif N;
                                                                                                                                                                                                                                               gP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 14.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Pred. No. 1.8e+03
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Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to a method for diagnosis of a disease or susceptibility to a disease associated with abnormal cell-cell adhesion between epithelial cells, comprising detecting a mutation in a nucleic acid encoding an adhesion protein, a protease or a protease inhibitor, or modulated level of adhesion protein, protease or protease inhibitor, or its fragment polypeptide. The method is useful for diagnosing a disease such as eczema, contact dermatritis, lung atopic asthma, post viral asthma, bronchial hyper-reactivity, chronic obstructive pulmonary disease, Crohn's disease, ulcerative colitis, coeliac disease, peptic ulceration, impetigo, viral warts, meningitis, skin melanoma, squamous cell carcinoma, basal cell carcinoma, cutaneous lymphoma, skin cancer, malignancy of the gastrointestinal tract, malignancy of the lung, psoriasis, acne vulgaris and psoriasis vulgaris. This sequence represent
Rat; secreted factor polypeptide; cardiac disease; renal disease; kidne; inflammatory disease; congestive heart failure; myocarditis; asthma; ss dilated congestive cardiomyopathy; angina pectoris; cardiac arrhythmia; myocardial infarction; pulmonary hypertension; arteriosclerosis; stroke
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Diagnosing a disease or susceptibility to a disease associated with abnormal cell-cell adhesion between epithelial cells, by detecting mutation in nucleic acid encoding adhesion protein, protease or protection.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence
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07-DEC-2000; 2000GB-00029879.
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                                                                                                                                                                                                                                  12-MAR-2002
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                                                                                                                                                                                                                               (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             in
                                                                                                                                                               DNA oligonucleotide probe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             the
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14.8; DB 1;
Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        This sequence represents
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Length 18;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Gaps
                                                                                                  kidney,
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RESULT 2076
ABS78455
ID ABS7845
XX ABS7845
XX ABS7845
XX T3-DECXX T3-DECXX Angloge
XX Angloge
XX Angloge
XX Angloge
XX Lumour
XW diabeti
XW corneal
XW rubeosi
XW rubeosi

Angiogenesis

(first

entry)

ABS78455 standard;

DNA; 18

0

tumour metastasis; precancerous lesion; rheumatoid arthritis; psoriasis; diabetic retinopathy; retinopathy of prematurity; macular degeneration; corneal graft rejection; neovascular glaucoma; retrolental fibroplasia; rubeosis; Osler-Webber Syndrome; myocardial angiogenesis;

joint

Angiogenesis inhibitor; ss; angiogenesis; solid tumour growth;

inhibitory oligonucleotide #939

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                                                                                                           Matches
                                                                                                                              Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                          The invention relates to rat secreted factor polypeptides and the polymucleotides encoding them. The sequences are useful for treating cardiac, renal or inflammatory diseases. These include cardiac disease such as congestive heart failure, myocardial infarction, cardiac arrhythmia, pulmonary hypertension, arteriosclerosis, atherosclerosis cardiac tumours, renal diseases such as glomerulonephritis, nephrotic syndrome, renal infarction, hereditary nephritis, polycystic kidney disease, chronic renal failure, renal vein thrombosis and medullary sponge kidney and inflammatory diseases such as asthma, rheumatoid arthritis, osteoarthritis, stroke, psoriasis, restenosis, graft versus host reaction, Crohn's disease, ulcerative colitis and Alzheimer's disease. Sequences AAS9463-AAS9475 represent cDNA clones, which encothe secret of feature proposed the content of the conten
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                renal infarction; hereditary nephritis; polycystic kidney disease; chronic renal failure; renal vein thrombosis; medullary sponge kidney; rheumatoid arthritis; osteoarthritis; psoriasis; restenosis; PCR primer; graft versus host reaction; Crohn's disease; ulcerative colitis; probe;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Alzheimer's disease; gene therapy
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Example 1; Page 51; 189pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel secreted factor polypeptide useful for treating cardiac diseas such as arteriosclerosis, myocardial infarction, inflammatory diseas such as asthma, stroke, and rheumatoid arthritis and renal diseases.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2002-010779/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Stanton LW, White
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   14-MAR-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               31-MAR-2000;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              atherosclerosis; cardiac tumour; glomerulonephritis; nephrotic syndrome;
                                                                                                                                                                                                                                                                   probes and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (SCIO-)
                                                                                                                                                                                                                                                                                      secreted factor polypeptides of the invention,
                                                 428
                                                                                                        16;
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18
                                                                                                                                                                                                                                                                   PCR primers
                                                                                                                                                                                                              BP;
                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   2000US-0193548P.
2001US-00809545.
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                                                                                                                                 Score 14.8;
Pred. No. 1.
                                                                                                           Mismatches
                                                                                                                                                                                                                 T; 0 U; 0 Other;
                                                                                                                                 .8e+03
                                                                                                                                                             DB 1;
                                                                                                                                                          Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              inflammatory diseases
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to inhibiting angiogenesis in a subject, comprising administering at least one antiangiogenic nucleic acid molecule. Also included is a kit comprising a first container housing the antiangiogenic nucleic acids, and instructions for administering them to a subject having a condition characterised by unwanted angiogenesis. The method is useful for inhibiting angiogenesis associated with solid timour growth,
                                                                                            tumour metastasis; precancerous lesion; rneumatoru artification; diabetic retinopathy; retinopathy of prematurity; macular degeneration; corneal graft rejection; neovascular glaucoma; retrolental fibroplasia; rubeosis; oSler-Webber Syndrome; myocardial angiogenesis; plaque neovascularisation; telangiectasia; haemophiliac joint; angiofibroma; wound granulation; intestinal adhesion; atherosclerosis; scleroderma; hypertrophic scar.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   diabetic retinopathy, retinopathy of prematurity, macular degeneration, corneal graft rejection, neovascular glaucoma, retrolental fibroplasia, rubeosis, Osler-Webber Syndrome, myocardial angiogenesis, plaque neovascularisation, telangiectasia, haemophiliac joints, angiotibroma, wound granulation, incestinal adhesions, atherosclerosis, scleroderma and hypertrophic scars. The present sequence is an antiangiogenic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Inhibiting angiogenesis in a subject, involves administering antiangiogenic nucleic acid molecule to the subject.
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scleroderma; h
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 18 BP; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         tumour metastasis, precancerous lesion, rheumatoid arthritis, psoriasis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2002-566690/60
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          14-DEC-2000; 2000US-025534P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABS78429 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (COLE-) COLEY
                    WO200253141-A2
                                                                                                                                                                                                                                                                                      Angiogenesis
                                                                                                                                                                                                                                                                                                                                       Angiogenesis
                                                                                                                                                                                                                                                                                                                                                                                                                                            ABS78429;
                                                                     Synthetic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   l Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                      inhibitor; ss; angiogenesis; solid tumour growth;
                                                                                                                                                                                                                                                                                                                                       inhibitory oligonucleotide #913.
                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             36; 276pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           PHARM GROUP INC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 14.8; I
Pred. No. 1.8e
0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                                  arthritis; psoriasis;
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                                                                                                                                                                                                                                                                                                                                                          RESULT 2078
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to inhibiting angiogenesis in a subject, comprising administering at least one antiangiogenic nucleic acid molecule. Also included is a kit comprising a first container housing the antiangiogenic nucleic acids, and instructions for administering them to a subject having a condition characterised by unwanted angiogenesis. The method is useful for inhibiting angiogenesis associated with solid tumour growth, tumour metastasis, precancerous lesion, theumacoid arthritis, psoriasis, diabetic retinopathy, retinopathy of prematurity, macular degeneration, corneal graft rejection, neovascular glaucoma, retrolental fibroplasia, rubeouscularisation, telangiectasia, haemophiliac joints, angiofibroma, wound granulation, intestinal adhesions, atherosclerosis, scleroderma and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Inhibiting angiogenesis in a subject, antiangiogenic nucleic acid molecule
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       14-DEC-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      11-JUL-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            neovascularisation, telangiectasia, haemo
wound granulation, intestinal adhesions,
hypertrophic scars. The present sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 2; Page 35; 276pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2002-566690/60
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Bratzler RL
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          14-DEC-2000; 2000US-0255534P
                                                                                                    modified_base
                                                                                                                                                 Synthetic
                                                                                                                                                                                angiogenesis;
                                                                                                                                                                                                  Antibody-induced cell lysis; cancer; immunostimulatory; CD20;
                                                                                                                                                                                                                                                               16-APR-2002
                                                                                                                                                                                                                                                                                                                           ABL39401 standard;
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27-DEC-2001.
                           WO200197843-A2
                                                                                                                                                                                                                                                                                              ABL39401;
                                                                                                                                                                                                                               Immunostimulatory nucleic acid SEQ ID
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                                                                                                                                                                                                                                                                                                                                                                                                                                    428
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                                                                                                                                                                                                                                                               (first entry)
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                                                                                                                                                                                   metastasis;
                                                                                                                    Location/Qualifiers
                                                                                                       1. .18
                                                                          mod_base= OTHER
                                                           note=
                                                                                                                                                                                                                                                                                                                             DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The present sequence is an antiangiogenic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   88.9%;
                                                        "phosphorothioate backbone"
                                                                                                                                                                                                                                                                                                                             18
                                                                                                                                                                                   cytostatic;
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                                                                                                                                                                                                                                                                                                                                                                                                                                      445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.8;
Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   .8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 18;
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22-JUN-2000; 22-JUN-2001;

2000US-0213346P 2001WO-US020154

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RESULT 2079
AAD41497
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    cancer, bone cancer, brain and central nervous system (CNS) cancer, breast cancer, cervical cancer, colon and rectum cancer, connective tissue cancer, oesophageal cancer, eye cancer, kidney cancer, larynx cancer, leukaemia, liver cancer, lung cancer, Hodgkin's lymphoma, non-Hodgkin's lymphoma, melanoma, myeloma, oral cavity cancer, ovarian cancer, pancreatic cancer, prostate cancer, rhabdomyosarcoma, skin cancer, stomach cancer, testicular cancer, and uterine cancer. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       cancer, involving administering to a subject having or at risk of developing cancer immunostimulatory nucleic acids that induce expression of cell surface antigens and antibodies. The methods are useful for treating or preventing cancer such as basal cell carcinoma, bladder
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Treating or preventing cancer, such as basal cell carcinoma, comprises administering immunostimulatory nucleic acids that induce expression of cell surface antigens and antibodies to a subject having or at risk of
Novel polypeptide having cytotoxic activity obtainable from Aplysia, useful for destroying tumors, for identifying novel targets for the development of anti-tumor agents, and as specific ion channel modulators.
                                                                                                                                                                                                                                                                                                                                                                 Apoptosis; ion channel modulator; hyperproliferative disease; tumour therapy; leukaemia; carcinoma; sarcoma; degenerative disease; melano Alzheimer's disease; parkinson's disease; arteriosclerosis; heart disease; stroke; vascular disease; nootropic; neuroprotective;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Weiner
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAD41497 standard; DNA; 18 BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Page 308; 312pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   developing
                                                                       WPI; 2002-537205/57
                                                                                                                                                                          13-OCT-2000; 2000EP-00122466.
                                                                                                                                                                                                            12-OCT-2001; 2001WO-EP011837.
                                                                                                                                                                                                                                                18-APR-2002
                                                                                                                                                                                                                                                                               WO200231144-A2
                                                                                                                                                                                                                                                                                                                                                 cerebroprotective; cardiant; cytotoxic protein; cyplasin L;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Oligonucleotide used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        30-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        present sequence is an immunostimulatory oligonucleotide exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present invention relates to methods for treating or preventing
                                                                                                                                          (PLAC ) MAX PLANCK GES FOERDERUNG WISSENSCHAFTEN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        2002-154611/20
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   428
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ຸດ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TTTTATTTTATTTTTTT 445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Hartmann
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cancer.
                                                                                                        Machuy N,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Q
                                                                                                                                                                                                                                                                                                                                                                                                                                                      for amplifying sea hare cyplasin L DNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   88.9%;
                                                                                                        Rudel T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 14.8;
Pred. No. 1.
                                                                                                        Meyer TF
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   .8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0,
                                                                                                                                                                                                                                                                                                                                                                                                     melanoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0,
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CC (ROS) and factors for generating or detoxifying reactive oxygen species CC (ROS) and factors for blocking and/or by-passing of caspases. They are CC useful for tumour therapy. Cytotoxic profeshs of the invention are useful cfor destroying tumours and/or selectively killing cells in tissues, for identifying novel targets for the development of pharmaceutical agents, corresponding to the companion of the correct corresponding to the correct corresponding to the correct cor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               activity obtainable from sea hare Aplysia. Sequences of the invention useful for the manufacture of cytotoxic agents against apoptosis resistant cells, where the agents are useful for diagnosis, prevention treatment of disorders associated with dysfunctions of GAP-SH3 binding
Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Example 5; Page 37; 87pp; English
18
BP; 0 A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 invention relates to novel polypeptides having cytotoxic
    G; 18 T; 0 U;
    0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                prevention,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   invention are
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Query Match
Best Local S
Matches 16
                                           Local Similarity
                428
                                   16;
_
           TTTTATTTTATTTTTTTT 445
Transferration 18
                                   Conservative
                                            1.5%;
                                  °;
                                            Score 14.8;
Pred. No. 1.
                                    Mismatches
                                             1.8e+03;
                                                      DB 1; Length 18;
                                     Indels
                                   °,
                                   Gaps
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RESULT 2080
Human chromosome 1p36-35 PCR primer SEQ ID NO:11.
                                                                                   ABL42967;
                                                                                                                           ABL42967 standard;
                                        11-APR-2002 (first entry
                                                                                                                           DNA; 18
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Human; chromosome 1p36-35; chromosome 21q22.1; genetic analysis; genome; PCR primer; ss.

Homo sapiens

JP2001321190-A

12-MAR-2001; 2001JP-00068285.

10-MAR-2000; 2000JP-00066716

(RIKA) RIKAGAKU KENKYUSHO. (GENO-) GENOTEX YG.

WPI; 2002-144136/19.

Arraying genome clones.

Claim 4; Page 5; 528pp; Japanese.

The present invention describes a method of arraying genome clones. The method comprises: (a) clones of the genomic libraries contained in multiwell plates numbered for discrimination are mixed in each of the multiwell plates; (b) a primer designed based on the chromosome marker sequence is added to the mixture to carry out an amplification reaction; (c) a signal corresponding to the marker is detected from the resultant

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ABLIA472 20
ABLIA4
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               amplified product to specify the discrimination Nos. of the multiwell plates containing the clones having said marker sequence; (d) the order of the markers is changed so that the same discrimination Nos. succeed to the maximum in the specified discrimination Nos. to array the multiwell plates; (e) the clones in the multiwell plates of the specified discrimination Nos. are mixed respectively in each wells of longitudinal and lateral directions; (f) the mixed clones are cultured and the resultant cultures are amplified by using the above primer; (g) signals are detected from the amplified products; (h) the clones in the multiwell
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      plates are specified from the detected result; and (i) the clones are reconstituted as the positions on the chromosome and arrayed. The microarray is useful for gene analysis. ABL42957 to ABL45322 represent
                            The present invention describes a method of arraying genome clones. The method comprises: (a) clones of the genomic libraries contained in multiwell plates numbered for discrimination are mixed in each of the multiwell plates; (b) a primer designed based on the chromosome marker sequence is added to the mixture to carry out an amplification reaction; (c) a signal corresponding to the marker is detected from the resultant amplified product to specify the discrimination Nos. of the multiwell plates containing the clones having said marker sequence; (d) the order of the markers is changed so that the same discrimination Nos. succeed to the maximum in the specified discrimination Nos. to array the multiwell plates; (e) the clones in the multiwell plates of the specified discrimination Nos. are mixed respectively in each wells of longitudinal and lateral directions; (f) the mixed clones are cultured and the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PCR primers for human chromosome 1036-35 DNA, and ABL45323 to ABL45634 represent PCR primers for human chromosome 21q22.1, which are specifically claimed for use in the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        11-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABL44445 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 JP2001321190-A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human chromosome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ABL44445
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (RIKA )
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; chromosome 1p36-35; chromosome 21q22.1; genetic analysis; genome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Arraying
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2002-144136/19
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             10-MAR-2000; 2000JP-00066716
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           12-MAR-2001; 2001JP-00068285
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          PCR primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          4.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     RIKAGAKU KENKYUSHO GENOTEX YG.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CTGCCTCAGCCTCCCAAG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Page
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           genome clones.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           CTGCCTCAGCCTCCAGAG
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          34;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      528pp; Japanese
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DNA; 18
       are amplified by using the above primer; (g) signals
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                555
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Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   SEQ ID NO:1489
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2;
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resultant cultures

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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  are detected from the amplified products; (h) the clones in the multiwe plates are specified from the detected result; and (i) the clones are reconstituted as the positions on the chromosome and arrayed. The microarray is useful for gene analysis. ABL42957 to ABL45322 represent PCR primers for human chromosome 1p36-35 DNA, and ABL43233 to ABL45634 represent PCR primers for human chromosome 21q22.1, which are specifically claimed for use in the present invention
second strand cDNA synthesis through a mechanism of terminal second strand cDNA synthesis through a mechanism of terminal continuation. In the method an RNA molecule is obtained and a first primer is added that comprises a region that hybridises to a complementary region of the molecule before a second primer is added comprising at least one riboguanine at the 3' end of the primer. A first complementary nucleic acid molecule is synthesised, the RNA molecule and second primer are removed and a second complementary nucleic acid molecule is synthesised to form a second hybrid with an extension product of the third primer bound to the first complementary molecule. The method of the invention is useful for increasing the efficiency of second strand cDNA synthesis and may be used for linear amplification of genetic signals from histologically stained tissue. The present sequence
                                                                                                                                                                                                                                                                                                                                                                                                                  14-FEB-2001;
14-FEB-2001;
18-JUL-2001;
07-NOV-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Terminal continuation, poly d(T).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18
                                                                                                                                                                                                                                          Increasing efficiency of second strand cDNA synthesis using terminal continuation model before performing further RNA amplification by RN
                                                                                                                                                                                                                                                                                        WPI; 2002-567050/60
                                                                                                                                                                                                                                                                                                                                             (BAYU )
(REME-)
                                                                                                                                                                                                                                                                                                                                                                                        07-NOV-2001;
09-NOV-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Synthetic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              29-NOV-2002
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                                                                                                                                                                      This invention relates to a novel method for increasing the
                                                                                                                                                                                                  Example 7; Page 80; 128pp; English
                                                                                                                                                                                                                              transcription.
                                                                                                                                                                                                                                                                                                                 Ginsberg
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         14-FEB-2002; 2002WO-US005713
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     22-AUG-2002
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                                                                                                                                                                                                                                                                                                                                               BAYLOR COL
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP;
                                                                                                                                                                                                                                                                                                                                                                                     ; 2001US-0268645P.
; 2001US-0268664P.
; 2001US-0306216P.
; 2001US-0344557P.
; 2001US-0348242P.
; 2001US-0350176P.
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                                                                                                                                                                                                                                                                                                                                                              COLLEGE
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                                                                                                                                                                                                                                                                                                                                                MENTAL
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       TC;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          C; 4
                                                                                                                                                                                                                                                                                                                                               MEDICINE.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ss; second
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0;
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Pred. No. 1.8e
0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       strand cDNA synthesis;
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                                                                                                                                                                            efficiency
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RESULT 2083
AAD36362/c
ID AAD3636
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Best Local
                                                                                                                                                                                                                                                                                                        The present invention relates to a method of analysing microsatellite loci. The method involves co-amplifying a set of three microsatellite loci comprising at least one mononucleotide repeat locus and at least two tetra-nucleotide repeat loci from a sample of genomic DNA in a multiplex amplification reaction using primers and determining the size of the amplified DNA fragments obtained. The method is useful for analysing microsatellite loci and for detecting microsatellite instability (MSI) in genomic DNA microsatellite loci of the second genomic DNA, where the MSI results are useful in prognostic tumour diagnosis, in diagnosis of familial tumour predisposition, to detect cancerous tumours of the gastrointestinal system and of the endometrium, where the cancerous tumours are tumours from a colorectal cancer. The method is useful for detection of the second genomic DNA according to 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Analyzing micro-satellite loci for detecting or diagnosing cancer, by co amplifying set of three microsatellite loci from DNA sample in multiplex reaction using primers, and determining size of amplified fragments.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human MONO-15 loci amplifying primer #2.
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                                                                                                                                           Sequence 18
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                                                                                                                                                                                                                      sequence
                                                                                                                                                                                                                                                                                         detecting or diagnosing diseases associated with MSI such as certain
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 6; Page 60; 73pp; English.
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                                                                                                                                                                                        pes of cancer and predisposition for cancer and in diagnostic assays to used to determine treatment and prognosis of disease. The present DNA quence is a primer which is used for amplifying human MONO-15 locus. is primer is used in the method of the invention
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88.9%;
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Pred. No. 1.8e+03
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Pred. No. 1.
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ABZ10473/c ID ABZ104

ABZ10473 standard; DNA; 18

ABZ10473;

RESULT 2085

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RESULT 2084
ABA93239
ID ABA9323
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                                                                                                                                                                                                  The present invention describes a method for the comparative detection of the amount of an RNA. The method comprises: (a) cONAs obtained by transcribing respectively from at least two tissue RNAs are respectively fragmented by using a same restriction enzyme; (b) each different adaptor and a common adaptor are added to each of the cDNA fragments derived from the same or different tissues by the step (a); (c) the resultant adaptor added cDNAs are mixed together; (d) an adaptor primer having the common sequence to said different adaptor and a gene-specific adaptor are used to amplify said adaptor-added cDNAs containing no region derived from the magnify said adaptor-added cDNAs containing no region derived from color added to magnify and adaptor added to the measured by the step (b); (e) the ratios of the cDNA amounts are measured between the tissues; (f) the RNA is detected from the measured result; (g) each different adaptor and a common adaptor are added to each of the genomic DNA fragments derived from a same or commixed together; (i) the adaptor-added genomic DNAs are amplified by using an adaptor primer having the common sequence to the different adaptor and common sequence represents an oligonucleotide which is used in the common sequence represents an oligonucleotide which is used in the common sequence.
                                                                                                                       Query Match
                                                                                   Matches
                                                                                                                                                                  Sequence 18 BP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other;
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                                                                                   Conservative
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Pred. No. 1.
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                                                                                                      1.8e+03
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16-JAN-2003

(first entry)

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                                                                                                                                                                                     lymphocytic leukaemia and acute myelogenous leukaemia; as probes for determining the cytosine methylation state and/or single nucleotide polymorphisms (SNPs) of haematopoietic cell proliferation disorder related sequences and their complements; and as primers for the amplification of haematopoietic cell proliferation disorder related DNA sequences. The nucleotide sequences from the present invention can also be used for detecting a predisposition to, differentiation between subclasses, diagnosis, prognosis, treatment and/or monitoring of haematopoietic cell proliferative disorders. The present method enables highly specific classification of haematopoietic cell proliferative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The present invention describes a mechanical proliferative disorders differentiating between haematopoietic cell proliferative disorders associated with at least 1 gene and/or their regulatory regions in a subject. The method comprises contacting a target nucleic acid in a subject. The method comprises contacting a target nucleic acid in a subject. The method comprises contacting a target nucleic acid in a subject.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Detecting and differentiating between hematopoietic cell proliferative disorders, comprises contacting a target nucleic acid with a reagent that
                                                                                                                                                                                                                                                                                                                                                                      represent specifically claimed nucleotide sequences from the present invention. Oligonucleotides from the present invention can be used: for differentiating between healthy haematopoietic cells and proliferative disorder haematopoietic cells; for differentiating between acute
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 15; Page 45; 117pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        distinguishes between methylated and non-methylated CpG dinucleotides.
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                                                                                                                                                                                                                                                                                                                                                                                                                                            which distinguishes between methylated and non-methylated CpG
dinucleotides within the target nucleic acid. ABZ09861 to ABZ11118
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                                                                                                                                      Sequence 18 BP; 4 A; 1 C; 7
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18
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                                                                                   Similarity
                               ACCACACCCCGCTAATTT 1072
ACCACACCCGACTAATTT 1
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C, Adorjan
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                                                                                   Score 14.8;
Pred. No. 1
                                                                      Mismatches
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                                                                                                                                                                         informed treatment
                                                                                   .8e+03
                                                                                                       DB 1;
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                                                                                                   Length 18;
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RESULT 2086 ABZ10474/c ID ABZ1047 XX

ABZ10474 standard;

DNA;

18 ВP

RESULT 2087 ABV76822/c ID ABV7682

ABV76822

standard; DNA; 18

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CC differentiating between haematopoietic cell proliferative disorders CC differentiating between haematopoietic cell proliferative disorders CC associated with at least 1 gene and/or their regulatory regions in a Subject. The method comprises contacting a target nucleic acid in a CC biological sample obtained from the subject with at least 1 reagent, CC which distinguishes between methylated and non-methylated CpG dinucleotides within the target nucleic acid. ABZ09961 to ABZ1118 CC represent specifically claimed nucleotide sequences from the present convention. Oligonucleotides from the present invention can be used: for CC invention. Oligonucleotides from the present invention can be used: for CC invention; the cytosine methylation state and/or single nucleotide collymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC lymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC lymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC lymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC lymphocytic leukaemia and acute myelogenous leukaemia; as probes for CC supclification of haematopoietic cell proliferation disorder related DNA sequences. The nucleotide sequences from the present invention can also CC used for detecting a predisposition to, differentiation between colleges of disorders allowing of haematopoietic cell proliferative disorders. The present method enables a highly specific classification of haematopoietic cell proliferative disorders. The present method enables a disorders and colleges of incorders and or method enables a disorders and colleges of incorders and colleges of inco
                                                                                                                         Query Match
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Olek A,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Detecting and differentiating between hematopoietic cell proliferative disorders, comprises contacting a target nucleic acid with a reagent the distinguishes between methylated and non-methylated CpG dinucleotides.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytosine methylation state; probe; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            16-JAN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ÀBZ10474;
                                                                                                                                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-018942/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (EPIG-) EPIGENOMICS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            26-MAR-2001; 2001US-0278333P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            26-MAR-2002; 2002WO-EP003401.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            03-OCT-2002.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WO200277272-A2
                                                                1055
18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              K, Braun A, Distler J,
, Piepenbrock C, Adorjan
A, Lipscher E, Maier S,
                                                                                                                                                        Similarity
                                           ACCACACCCCGCTAATTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Lipscher E, I, Ziebarth H;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Page 45; 117pp;
                                                                                                                                                                                                                                                                                                                       allowing for improved and informed treatment
                                                                                                                         1.5%;
nilarity 88.9%;
Conservative
                                                                                                                                                                                                                                                             BP; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                                                                                                                                                                                                          A; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ਨ
G
                                                                                                                                                                                                                                                             C; 7
                                                                1072
                                                                                                                             0;
                                                                                                                                                                                                                                                             G; 7 T; 0
                                                                                                                                                           Score 14.8;
Pred. No. 1
                                                                                                                                Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Guetig D,
1 P, Grabs
Model F,
                                                                                                                                                                                                                                                             Ç,
                                                                                                                                                                  1.8e+03
                                                                                                                                                                                                                                                                 0 Other
                                                                                                                                                                                                띪
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 G, Lesche R, Leu E
Mueller V, Otto T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Howe A,
                                                                                                                                                                                             <u>1</u>.
                                                                                                                                   2
                                                                                                                                                                                             Length 18;
                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mueller J;
                                                                                                                                                                                                                                                                                                                                 of patients
                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Ħ
                                                                                                                                Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Pelet C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      #614
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RESULT 2088
AAD56466/c
ID AAD5646
XX AAD5646
XX Target
XX Target
XX ACYCLIC
XX Unident
XX WO20030
XX WO20030
PF 29-OCT-
XX PF 29-OCT-
XX PI Damha P
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                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local (
                                                                                                                                                                                                                                                                                                                            Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Genomic DNAs participating in rheumatoid arthritis, applicable in diagnosis as well as judging onset risks of and screening drugs for the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Rheumatoid arthritis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ABV76822;
                                                                                                                                                                   Target
                                                                                                                                                                                         07-AUG-2003
                                                                                                                                                                                                                                AAD56466 standard;
                                                                                                                                                                                                                                                                                                                                                                    Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example 1; Page 7; 25pp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Shiozawa S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             30-MAR-2001; 2001JP-00102006
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  29-MAR-2002; 2002WO-JP003191.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WO200279466-A1
  Damha MJ,
                                          29-OCT-2001; 2001US-0330719P
                                                              29-OCT-2002;
                                                                                   08-MAY-2003
                                                                                                      WO2003037909-A1
                                                                                                                           Unidentified
                                                                                                                                               Acyclic linker;
                                                                                                                                                                                                             AAD56466;
                                                                                                                                                                                                                                                                                                                                                                                                   rheumatoid
                                                                                                                                                                                                                                                                                                                                                                                                                      rheumatoid arthritis.
                                                                                                                                                                                                                                                                                                                                                                                                                                 The specification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (SHIO/) SHIOZAWA S.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      10-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           12-FEB-2003
                      (UYMC-) UNIV MCGILL.
                                                                                                                                                                                                                                                                                                                                                                                                The specification describes a genomic DNA sequence which theumatoid arthritis. The DNA is applicable in diagnosis judging onset risks of, and screening drugs for treating theumatoid arthritis. The present PCR primer was used in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     primer used to amplify a human cDNA sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2003-046814/04.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              sapiens.
                                                                                                                                                                                                                                                                                    18
                                                                                                                                                                  RNA #1 used in the exemplification of
                                                                                                                                                                                                                                                                                                                                     Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       based on gene mutation.
                                                                                                                                                                                                                                                                                                        ATTACAGGCGTGAGCCAC
 Viazovkina E,
                                                                                                                                                                                                                                                                                                                                                                    BP; 3 A; 4 C; 6
                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                      (first entry)
                                                               2002WO-CA001628
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Komai K,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first
                                                                                                                                               gene
                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                 RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            entry)
                                                                                                                                               expression; gene therapy; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   onset risk; PCR; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Yagi H,
                                                                                                                                                                                                                                 18
  Mangos MM,
                                                                                                                                                                                                                                 ВP
                                                                                                                                                                                                                                                                                                       887
                                                                                                                                                                                                                                                                                     \vdash
                                                                                                                                                                                                                                                                                                                          0
                                                                                                                                                                                                                                                                                                                                                                    G; 5 T; 0
                                                                                                                                                                                                                                                                                                                                     Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matsuura
                                                                                                                                                                                                                                                                                                                                                                    ď,
  Parniak MA,
                                                                                                                                                                                                                                                                                                                                     .8e+03;
                                                                                                                                                                                                                                                                                                                                                                    0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      z
                                                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                    the
                                                                                                                                                                                                                                                                                                                                               Length 18;
                                                                                                                                                                                                                                                                                                                            Indels
  Min
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                                                                                                                                                                                                                                                                                                                                                                                                 h participates in s as well as g or preventing, n the course of
                                                                                                                                                                                                                                                                                                                            0
                                                                                                                                                                                                                                                                                                                            Gaps
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SXCCCCCCCCCXXXXTTTXXX
                                                                                                                                                                                                                                                                                                                                                                                        decreasing target RNA
                                                                  The invention relates to an acyclic linker-containing oligonucleotide comprising at least one modified deoxyribonucleotide. Oligonucleotides of the invention are useful for preventing or decreasing translation, reverse transcription and/or replication of a target RNA in a system. They are useful for selectively preventing gene expression in a sequence-specific manner, for hybridising to complementary RNA such as cellular mRNA or viral RNA, to hybridise to and induce cleavage of complementary RNA. They are also useful therapeutically in formulations or medicaments to prevent or treat a disease characterised by the expression of a particular target RNA. The invention is used in gene therapy. The present
Sequence 18 BP; 18
                                                                                                                                                                                                                                                                                                                                          Example 2; Fig 5; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-421516/39.
                                           sequence is a target RNA, used in the exemplification
                                                                                                                                                                                                                                                                                                                                                                                                                 acyclic linker-containing oligonucleotide useful for preventing asing translation, reverse transcription and/or replication of a
                                                                                                                                                                                                                                                                                                                                                                                        translation, in a system,
A; 0 C; 0 G; 0 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                     reverse transcription and/or replication comprises a modified deoxyribonucleotide.
                                                  of the invention
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Query Match
Best Local S
Matches 16
           428
18
                         16;
                                Similarity
            TTTTATTTATTTTTTT
TTTTTTTTTTTTTTTT
                         Conservative
                               1.5%;
ب
             445
                         0
                                Score 14.8;
Pred. No. 1.
                          Mismatches
                       1.8e+03;
2;
                                       멂
                                       1;
                                     Length
                          Indels
                                       18;
                          0
                         Gaps
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RESULT 2089
AAD56440
                                                                                                                                                                                                                  07-AUG-2003
                                                                                                                                              08-MAY-2003
                                                                                                                                                                       Unidentified.
                                                                                                                                                                                                     Antisense oligo #1, to elicit RNase H degradation of target RNA.
                                                                                                                                                                                                                              AAD56440;
                                                                                                                                                                                                                                          AAD56440
                                                                                           Damha MJ,
                                                                                                                    29-OCT-2001; 2001US-0330719P.
                                                                                                                                 29-OCT-2002; 2002WO-CA001628
                                                                                                                                                          WO2003037909-A1
                                                                                                                                                                                  antisense;
                                                                                                                                                                                         Acyclic linker;
                                                                                                       (UYMC-) UNIV MCGILL
                                                                                                                                                                                                                                          standard;
                                                                                           Viazovkina
                                                                                                                                                                                                                  (first
                                                                                                                                                                                        gene expression; gene therapy; ribonuclease; RNase H;
                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                                                  entry)
                                                                                           'n
                                                                                                                                                                                                                                          18
                                                                                           Mangos
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                                                                                             Parniak MA,
                                                                                             M
T
D
                                                                                             ζ,
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The invention relates to an acyclic linker-containing oligonucleotide comprising at least one modified deoxyribonucleotide. Oligonucleotides the invention are useful for preventing or decreasing translation, reverse transcription and/or replication of a target RNA in a system. They are useful for selectively preventing gene expression in a sequence specific manner, for hybridising to complementary RNA such as cellular

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Novel acyclic linker-containing oligonucleotide useful for preventing decreasing translation, reverse transcription and/or replication of a target RNA in a system, comprises a modified deoxyribonucleotide.

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translation, in a system,

Example 2;

Fig

9; 104pp; English

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RESULT 2090
AAD56446
XX
AAD5644
XX
AC AAD5644
XX
AC AAD5644
AC AAD6644
AC AAD6644
AC AAD
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Best Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     mRNA or viral RNA, to hybridise to and induce cleavage of complementary RNA. They are also useful therapeutically in formulations or medicaments to prevent or treat a disease characterised by the expression of a particular target RNA. The invention is used in gene therapy. The present sequence is an antisense oligo used to elicit human RNase (ribonuclease) H degradation of target RNA. This sequence is used in the exemplification
The invention relates to an acyclic linker-containing oligonucleotide comprising at least one modified decoxyribonucleotide. Oligonucleotides of the invention are useful for preventing or decreasing translation, reverse transcription and/or replication of a target RNA in a system. They are useful for selectively preventing gene expression in a sequence-specific manner, for hybridising to complementary RNA such as cellular mRNA or viral RNA, to hybridise to and induce cleavage of complementary RNA. They are also useful therapeutically in formulations or medicaments to prevent or treat a disease characterised by the expression of a particular target RNA. The invention is used in gene therapy. The present sequence is an antisense oligo used to elicit human RNase (ribonuclease) H degradation of target RNA. This sequence is used in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Novel acyclic linker-containing oligonucleotide useful for preventing decreasing translation, reverse transcription and/or replication of a target RNA in a system, comprises a modified deoxyribonucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            2'F-ANA antisense oligo #1,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        07-AUG-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                        Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-421516/39
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           29-OCT-2001; 2001US-0330719P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29-OCT-2002; 2002WO-CA001628
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   08-MAY-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              modified_base
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   antisense;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Acyclic linker;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (UYMC-) UNIV MCGILL
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              428
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                                                                                                                                                                                                                                                                                                                                                                                                                                     2; Fig
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Viazovkina
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                        7; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ,mod
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            note=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         _base= OTHER
e= "2'-deoxy-2'-fluoroarabinothymidine"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         expression; gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   'n
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mangos
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Pred. No. 1
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RESULT 2092 AAD57871 ID AAD5787

AAD57871 standard; DNA;

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RESULT:
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ID ACHO324
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Best Local
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3247
                                                                                                                                                                                                            The invention describes a method of treating non-allergic inflammatory disease comprising administering to a subject having or at risk of developing a non-allergic inflammatory disease an immunostimulatory nucleic acid for prevention or treatment of the disease. The method is useful for treating non-allergic inflammatory diseases, such as psoriasis, eczema, allergic contact dermatitis, latex dermatitis or inflammatory bowel disease e.g., ulcerative colitis or Crohn's disease. This sequence represents an immunostimulatory nucleic acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Treating non-allergic inflammatory diseases, e allergic contact dermatitis, latex dermatitis
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      29-MAR-2001; 2001US-0279642P
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                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     disease
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(BERG/)
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BERG D J.
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                                                                                                                                                                         B₽;
                                                                                        Conservative
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Pred. No. 1.8e
0; Mismatches
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Pred. No. 1.8e+03;
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                                                                                     Mismatches
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                                                                                                                                  DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              or inflammatory bowel
                                                                                        2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       nucleic acid.
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                                                                                                                               Length 18;
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                     target RNA in a system, validating a gene target corresponding to a target RNA in a system or preventing or treating a disease related to a target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) or hepatitis B. The invention is useful in gene therapy. The present sequence is an antisense oligonucleotide used in the exemplification of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention relates to a new oligonucleoside which comprises at least one sugar modified nucleoside. The first segment comprises at least one 2'-deoxynucleoside. The oligonucleoside comprises at least 2 ceach of the first and second segments, so that it comprises at least 4 eleach of the first and second segments, so that it comprises at least 4 alternating segments. The oligonucleotide is useful for preparing a composition for inducing RNase H-mediated cleavage of a target RNA in a system, preventing or decreasing translation, transcription or replication of a target RNA in a system, detecting the presence of a
Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                07-AUG-2003
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                                           Sugar-modified nucleoside; acquired immune deficiency syndrome; hepatitis B; gene therapy; virucide; anti-HIV; antisense; DNA-RU
                                                                                                                                                                                                                                                                                                                                                                                           Sequence 18 BP; 0 A; 0 C; 0 G; 18 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New oligonucleotide, useful for preventing or treating a disease related to a target RNA in a system, e.g., AIDS or hepatitis B.
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                                                                                                                                                       AAD57878;
                                                                                                                                                                                      AAD57878 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                          the invention
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                                                                                       Antisense DNA-RNA hybrid #2 used in the exemplification of the invention
                                                                                                                        20-NOV-2003
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Pred. No. 1
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                                           drome; AIDS;
DNA-RNA hybrid,
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                                                                                                                                                 RESULT 2094
AAD57879
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Best Local Similarity
Matches 7; Conserv
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                                                                                                                                                                                                                                                                                                                                     Sequence 18 BP; 0 A; 0 C; 0 G; 9 T; 9 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New oligonucleotide, useful for preventing to a target RNA in a system, e.g., AIDS or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Damha MJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Q1-FEB-2002; 2002US-0352873P
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                                                                         20-NOV-2003
                                                                                                                                                                                                                                                                                                                                                                    the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2003-689523/65
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                                                                                                       AAD57879;
                                                                                                                                    AAD57879 standard;
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note= "2'-0-methyl-D-uridine"
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note= "2'-O-methyl-D-uridine"
                                                                                                                                    DNA; 18
                                                                                                                                                                                                                                                                                       1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             "2'-O-methyl-D-uridine"
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                                                                                                                                                                                                                                                                                         Score 14.8;
Pred. No. 1
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                                                                                                                                                                                                                                                                                                          BB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                or treating hepatitis B.
                                                                                                                                                                                                                                                                                                       1;
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Sugar-modified nucleoside; acquired immune deficiency syndrome; AIDS; hepatitis B; gene therapy; virucide; anti-HIV; antisense; DNA-RNA hybrid;

Antisense DNA-RNA hybrid #3 used in

the exemplification of the invention

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RESULT 2095
AAD57877
ID AAD5787
XX AAD5787
AC AAD5787
XC AAD5787
XZ 20-NOV-
XZ 20-NOV-
XX BARTISET
XX Sugar-n
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Sugar-modified nucleoside; acquired immune deficiency syndrome; hepatitis B; gene therapy; virucide; anti-HIV; antisense; DNA-RN ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              The present invention relates to a new alternating first and second segments.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Example 2; Page 35; 73pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New oligonucleotide,
to a target RNA in a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-689523/65
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    01-FEB-2002; 2002US-0352873P
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                                                                                                                                                                                                                                                                                                                                                           sequence is an the invention
                                                                                                                                                                                                                                                                                                                                Sequence 18 BP; 0
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                                                       Antisense DNA-RNA hybrid #1 used in the exemplification of the invention.
                                                                                   20-NOV-2003
                                                                                                                                          AAD57877 standard; DNA; 18
                                                                                                                                                                                                                                                                                       Local
                                                                                                                                                                                                                               428 TTTTATTTTATTTTTTT 445
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                                                                                                                                                                                                                                                                      Similarity 5; Conserv
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/label= RNA
/note= "2'-O-methyl-D-uridine"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     useful for preventing system, e.g., AIDS or
                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 relates to a new oligonucleoside which comprises second segments. The first segment comprises at
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= RNA
= "2'-O-methyl-D-uridine"
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                                                                                                                                                                                                                                                                        Score 14.8; Di
Pred. No. 1.8e
L1; Mismatches
                                                                                                                                                                                                                                                                                                                                12 U; 0 Other;
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                                                                                                                                                                                                                                                                                                      DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      or treating hepatitis B.
                                                                                                                                                                                                                                                                                                   Length 18;
                                                                                                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  a disease related
                DNA-RNA hybrid;
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Key
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WO2003064441-A2.
                                           misc_RNA
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17
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"2'-
                = RNA
"2'-O-methyl-D-uridine"
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"2'-0-methyl-D-uridine"
                                                  h
= RNA
"2'-O-methyl-D-uridine"
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= RNA
"2'-O-methyl-D-uridine"
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"2'-O-methyl-D-uridine"
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                                                                                                                                                                                                                                 -O-methyl-D-uridine"
                                                                                                                                                             -O-methyl-D-uridine"
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07-AUG-2003.

31-JAN-2003; 2003WO-CA000129

01-FEB-2002; 2002US-0352873P

(UYMC-) UNIV MCGILL

Damha MJ, Parniak MA

WPI; 2003-689523/65

New oligonucleotide, useful for preventing or treating a disease related to a target RNA in a system, e.g., AIDS or hepatitis B.

Example 2; Page 35; 73pp; English.

The present invention relates to a new oligonucleoside which comprises at least one sugar modified nucleoside. The first segment comprises at least one sugar modified nucleoside. The second segment comprises at least one 2'deoxynucleoside in the oligonucleoside comprises at least 2 of each of the first and second segments, so that it comprises at least 4 alternating segments. The oligonucleotide is useful for preparing a composition for inducing RNase H-mediated cleavage of a target RNA in a system, preventing or decreasing translation, transcription or replication of a target RNA in a system, validating a gene target corresponding to a target RNA in a system, validating a gene target corresponding to a target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) or hepatitis B. The invention is useful in gene therapy. The present

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RESULT 2096
AAD57890/c
ID AAD5789
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                                                                                                                                                                                                                                                                                                                                                                                                                                                        The present invention relates to a new oligonucleoside which comprises at CC alternating first and second segments. The first segment comprises at CC least one sugar modified nucleoside. The second segment comprises at CC least one 2'-deoxynucleoside. The oligonucleoside comprises at least 2 of each of the first and second segments, so that it comprises at least 4 cC alternating segments. The oligonucleotide is useful for preparing a CC composition for inducing RNase H-mediated cleavage of a target RNA in a comprise segment, at the comprise of a composition or a target RNA in a system, replication of a target RNA in a system, detecting the presence of a carget RNA in a system, validating a gene target corresponding to a composition for inducing RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) C target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) C target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) C target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) C target RNA in a system, e.g., acquired immune deficiency syndrome (AIDS) C target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating a disease related to a CC target RNA in a system or preventing or treating the present composition for the invention is usef
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Best Local S
Matches 8
                                                                                                                                                                                       Query Match
Best Local S
Matches 16
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                                                                                                                                                                                                                                                                                                                                                                              Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           a target RNA in a system, e.g.,
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                                                                                                                                                                                       l Similarity
16; Conserv
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8; Conserv
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Pred. No. 1
                                                                                                                                                                                                                                        Score 14.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                   G; 0 T; 0 U; 0 Other;
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RESULT 2097
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                                                                                                                                                                            RESULT 2098
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                   in any complete or partial genetic map of the human genome. GH-
polypeptides are useful as antagonists of GH-1 hormone action.
Polypucleotides encoding these polypeptides are useful in gene
The present sequence is a PCR primer used for amplifying human
                                                                                                                                                                                                                                                                                                                                                                                 The invention relates to growth hormone 1 (GH-1) gene including single nucleotide polymorphisms (SNP). The GH-1 diagnostic polymucleotide is useful as markers for the analysis of a disease, of susceptibility to drug treatment for GH-1 dysfunction or other diseases, or may be included
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New growth hormone 1 (GH-1) diagnostic polynucleotide, useful as markers for the analysis of a disease, or of susceptibility to drug treatment for GH-1 dysfunction or other diseases.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2003-449555/42.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          09-NOV-2001; 2001US-0347448P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; growth
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                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 2; Page 30; 74pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          22-MAY-2003
                     Synthetic
                                                        dв; allergy;
                                                                                                       04-DEC-2003
                                                                                                                              ADB37210;
                                                                                                                                                       ADB37210 standard;
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                                          hypo-responsive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (PHAA)
                                                                               [mmunostimulatory nucleic acid
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                                                                                                                                                                                                                                                               Conservative
                                                        asthma; poly-G nucleic acid; aerosol formulation;
                                                                                                      (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
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                                            subject; immunostimulatory.
                                                                                                                                                       DNA;
                                                                                                       entry)
                                                                                                                                                                                                                                                                         1.5%;
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                                                                                                                                                                                                                                                                         Score 14.8; DB 1;
Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                  therapy
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US2003087848-A1.

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RESULT 2099
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                   The invention relates to a method of treating or preventing allergy or asthma which comprises administering to a subject a poly-G nucleic action an aerosol formulation. The method compositions of the present invention are useful for diagnosing and/or treating asthma and allergy especially in a hypo-responsive subject. The present sequence represent an immunostimulatory nucleic acid of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (BRAT/)
(PETE/)
(FOUR/)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Bratzler RL,
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                                                                                                                                                      08-MAY-2003
                                                                                                                                                                         US2003087848-A1.
                                                                                                                                                                                                            hypo-responsive
                                                                                                                                                                                                                      ds; allergy; asthma; poly-G nucleic acid; aerosol formulation;
                                                                                                                                                                                                                                                                                               ADB37236 standard;
                                                                                                                    03-FEB-2000;
                                                                                                                                    02-FEB-2001;
                                                                                                                                                                                                                                       Immunostimulatory nucleic acid
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                                              2003-657977/62
                                                                                                                                                                                                                                                                                                                                                                               16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ) BRATZLER R
) PETERSEN D |
) FOURON Y.
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                                                                               PETERSEN D M. FOURON Y.
                                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    and/or preventing allergy or asthma using an immunostimulatory
acid alone or in combination with an asthma/allergy medicament.
                                                                                                                                                                                                                                                                                                                                                                                                                    18
                                                                                                                                                                                                                                                                                                                                                             TTTTATTTATTTTTTT
                                                              RL,
                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 0 A;
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                                                                                                                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                    2001US-00776479
                                                                                                                    2000US-0179991P
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                                                               Petersen
                                                                                                                                                                                                              subject;
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                                                                                                                                                                                                                                                                                               DNA;
                                                                                                                                                                                                                                                          entry!
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                                                                                                                                                                                                              immunostimulatory.
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                                                               Fouron Y;
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acid
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Disclosure;

Page 18;

221pp; English

and/or preventing allergy or asthma using an immunostimulatory acid alone or in combination with an asthma/allergy medicament.

The invention relates to a method of inhibiting corneal allograft rejection, by contacting the allograft with a topical formulation comprising an antisense oligonucleotide targeted to intercellular adhesion molecule-1 (ICAM-1), extracellular adhesion molecule-1 (ELAM-1) or vascular cell adhesion molecule-1 (VCAM-1). The oligonucleotide is useful for inhibiting corneal allograft rejection or for preserving a corneal explant ex vivo, where the explant is human. This sequence

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Example

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RESULT 2100
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                ss; primer; immunosuppressive; antisense therapy; corneal allograft rejection; intercellular adhesion molecule-1; ICAM-1; extracellular adhesion molecule-1; ELAM-1; vascular cell adhesion molecule-1; VCAM-1; corneal explant.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADC38978 standard; DNA; 18
                                                                                                                          molecule-1, molecule-1.
                                                                                                                                    Inhibiting corneal allograft rejection, by contacting an allograft with formulation having an oligonucleotide targeted to intercellular adhesion molecule-1, extracellular adhesion molecule-1 or vascular cell adhesion
                                                                                                                                                                               WPI;
                                                                                                                                                                                                                                                                   16-OCT-2002; 2002WO-US033236
                                                                                                                                                                                                                                                                                                               WO2003032920-A2
                                                                                                                                                                                                                                                                                                                                                               misc_difference
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/note= "internucleotide linkages
whosphodiester bonds"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14.8; DB 1;
No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                              optionally
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ADE14006
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AC ADE1
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                                                                                                                                                                          RESULT 2101
ADD31139/c
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                                             RESULT 2102
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Best Local
                                                                                                                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18
                                                                                                                                                                                                          The invention relates to a method of analysing microsatellite loci. Invention is used to detect microsatellite instability in prognostic tumour diagnosis, particularly a familial tumour predisposition, especially to detect cancerous tumours of the gastrointestinal system endometrium, most particularly colorectal cancer. The present sequence
  ADE14006
                                                                                                                                                                                                                                                                                                              Analyzing microsatellite instability by amplification of multiple loci including mono-nucleotide and tetra-nucleotide repeats useful to detect cancerous gastrointestinal or endometrium tumors particularly colorectal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ss; PCR; primer; human; microsatellite locus;
prognostic tumour diagnosis; familial tumour predisposition;
cancerous tumour; gastrointestinal cancer; endometrial cancer;
                        ADE14006 standard; DNA; 18
                                                                                                                                                                          Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                  15-SEP-2000; 2000US-00663020
24-APR-2001; 2001US-00841366
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human microsatellite locus PCR primer #8.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADD31139
                                                                                                                                                                                               represents a human microsatellite locus PCR primer.
                                                                                                                                                                                                                                                                                Claim 4;
                                                                                                                                                                                                                                                                                                                                                             WPI; 2003-830985/77
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   09-DEC-2002; 2002US-00314810
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          25-SEP-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               colorectal cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                           (PROM-) PROMEGA CORP.
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                                                                                                                           l Similarity
16; Conserv
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                                                                                               CTCACTGCAACCTCTGCC
                                                                                                                                                                                                                                                                                SEQ ID NO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TCCTCCCACCTCAGCCTC 1
                                                                                CTCACTGCAAGCTCCGCC
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                                                                                                                            Conservative
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                                                                                                                                     1.5%;
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                                                                                                                                                                          3 C; 9
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                                                                                                                                                                          G; 3 T; 0 U; 0 Other;
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Pred. No. 1
                                                                                                                                       Score 14.8;
Pred. No. 1
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                                                                                                                             Mismatches
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                                                                                                                                                Length 18;
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                                                                                                  Query Match
                                                                    Matches
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                                                                                                                                                                                                                             or progression of glaucoma in a patient, comprising providing amplification reaction primers that direct amplification of a selected nucleic acid region containing the variation within the optineurin promoter and amplifying the DNA) and detecting a polymorphism (comprising obtaining a sample containing human genomic DNA, providing a nucleic acid capable of detecting a SNP located within an optineurin promoter, and detecting the polymorphism). The invention is used to diagnose and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    glaucoma
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human; optineurin; SNP; glaucoma; proc
                                                                                                                                                                                    prognose glaucoma and also to treat glaucoma related disorders. The present sequence is an optineurin promoter marif
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and related
                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                                                                                          susceptibility to glaucoma or to a progressive ocular hypertensive disorder resulting in loss of visual field in a patient (or the severity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 11;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2003-864168/80
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Raymond V,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        06-MAR-2002; 2002US-00091281.
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                                                                                                                                                                             putative
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                                                                                   Local
                                 899
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                                                                                     Similarity
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ucoma; progressive ocular hypertensive disorder;
related disorder; motif; repeat element; regulatory region.
                             TCTTGGCTCACTGCAACC 685
                                                                                                                                                                             regulatory
TCTTGGCTCAGCGCAACC 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              SEQ ID NO 117; 159pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         promoter motif,
                                                                                                                                       BP; 3 A; 7 C; 4 G; 4 T; 0 U;
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                                                                    Conservative
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                                                                                                                                                                             region.
                                                                                     1.5%;
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                                                                                     Score 14.8;
Pred. No. 1
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                                                                      Mismatches
                                                                                     .8e+03;
                                                                                                                                           0 Other;
                                                                                                        DB 1;
                                                                                                      Length 18
                                                                      Indels
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ADE14244 ID ADE1

ADE14244 standard;

DNA; 18

ВP

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RESULT 2103

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                                                                                                                                                                                                                                                                                                                                        The invention relates to an isolated nucleic acid (NI) comprising at CC least 20 but not more than 1500 consecutive nucleotides of the optineurin CC promoter appearing as ADE13890. Also included are the optineurin promoter CC operably linked to a heterologous nucleic acid, a nucleic acid capable of CC detecting a single nucleotide polymorphism (SNP) in the optineurin CC promoter, a host cell comprising the promoter operably linked to a CC heterologous sequence, diagnosing or prognosing glaucoma in a sample CC obtained from a cell or bodily fluid (comprising detecting a polymorphism CC in a promoter region of the optineurin gene, associated with a glaucoma CC in a promoter region of the optineurin gene, associated with a glaucoma CC DNA, detecting a SNP sequence variation in a sample containing DNA, determining the presence or increased CC susceptibility to glaucoma or to a progressive ocular hypertensive CC disorder resulting in loss of visual field in a patient (or the severity correction of clausoma in a patient (or the severity correction).
                                                               Query Match
Best Local S
Matches 16
                                                                                                                                                                                 or progression of glaucoma in a patient, comprising providing amplification reaction primers that direct amplification of a selected nucleic acid region containing the variation within the optineurin promoter and amplifying the DNA) and detecting a polymorphism (comprising obtaining a sample containing human genomic DNA, providing a nucleic acid capable of detecting a SNP located within an optineurin promoter, and detecting the polymorphism). The invention is used to diagnose and prognose glaucoma and also to treat glaucoma related disorders. The present sequence is an optineurin promoter motif, repeat element or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SNP; glaucoma; progressive ocular hypertensive disorder; glaucoma related disorder; motif; repeat element; regulatory region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Optineurin promoter motif, repeat element
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADE14244;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 11; SEQ ID NO 355; 159pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2003-864168/80
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (SIEE/) SI E.
(RAYM/) RAYMOND V.
(MORI/) MORISSETTE
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             06-MAR-2002; 2002US-00091281
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                                                                                                                                    Sequence
                                                                                                                                                                        putative
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                                                                                   Similarity
                                                                                                                                      18
                              TTCACCATGTTCGCCAGG 812
                                                                                                                                                                     regulatory region.
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                                                                                                                                      BP;
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                                                                    Conservative
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                                                                                   1.5%;
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                                                                                                                                    C; 4
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                                                                                   Score 14.8;
Pred. No. 1
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                                                                      Mismatches
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                                                                                   1.8e+03;
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                                                                                                                                      0 Other;
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                                                                                                       DB 1;
                                                                                                   Length 18;
                                                                        Indels
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RESULT 2104

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TCTCACCCAAGCTGGAGT TGTCACCCAGGCTGGAGT

638 18

Query Match Best Local (Matches

Similarity

1.5%; 4 C; 6

0

Mismatches

1.8e+03 DB 1; 2;

Length 18; Indels

0

Gaps

0

18

BP; 4

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G; 4 T; 0 Score 14.8; Pred. No. 1

U; 0 Other

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The invention relates to an isolated nucleic acid (N1) comprising at CC least 20 but not more than 1500 consecutive nucleotides of the optineurin CC promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of CC detecting a single nucleotide polymorphism (SNP) in the optineurin CC promoter, a host cell comprising the promoter operably linked to a CC promoter region of the optineurin gene, associated with a glaucoma CC phenotype), detecting a SNP sequence variation in a sample containing the presence of an optineurin promoter sequence variation in a sample containing DNA, detecting a sample containing CC disorder resulting in loss of visual field in a patient (or the severity or progression of glaucoma in a patient, comprising providing containing and amplifying the DNA) and detecting a polymorphism (comprising a containing a sample containing the variation within the optineurin companie of detecting a sample containing the variation within the optineurin companie of detecting a sample containing the variation within the optineurin companie of detecting a sample containing the variation within the optineurin companie of detecting a SNP located within an optineurin promoter, and companie of detecting a sample containing the variation within the optineurin compone and companies of detecting a sample containing the variation within the optineurin compone of the containing the variation of a selected containing a sample containing the variation within the optineurin compone of the containing the variation within an optineurin promoter, and compone of detecting the polymorphism. The invention is used to diagnose and component of the containing the variation within an optineurin promoter. The present sequence is an optineurin promoter motif, repeat element or containing the variation within an optineurin promoter.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SNP; glaucoma; progressive ocular hypertensive disorder; glaucoma related disorder; motif; repeat element; regula
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New nucleic acid sequences of the optineurin gene are useful to polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 11;
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(RAYM/)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     optineurin; ds; ophthalmological; single nucleotide polymorphism;
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RAYMOND V.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        <
                                           regulatory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   SEQ ID NO 314; 159pp; English
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RESULT 2105
ADE77617/c
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                                                                                                                                                              This invention relates to a novel method for the concurrent interrogation of a number of polymorphic sites in the presence of, and without interference from, non-designated polymorphic sites. Specifically, it comprises conducting a multiplexed elongation assay by applying one or more temperature cycles to achieve linear amplification of the target or a combination of annealing and elongation steps under temperature-controlled conditions. Furthermore, this detection method uses probe extension or elongation and relies on enzymatic recognition, a superior technique that no longer depends on differential hybridisation. The present invention describes probes and methods useful for identifying or detecting polymorphisms at one or more designated sites, such that they can identify mutations within the cystic fibrosis conductance transmembrane regulator (CTR) or the human leukocyte antigen (HLA) genes. In addition, concurrent interrogation of a multiplicity of polymorphic sites is useful for genetic testing, carrier screening, genotyping or genetic profiling, and identity testing. This conductation is the negative control probe used for the elongation of the
                                                          Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-OCT-2001; 2001US-0329427P.
15-OCT-2001; 2001US-0329428P.
15-OCT-2001; 2001US-0329619P.
15-OCT-2001; 2001US-0329620P.
14-MAR-2002; 2002US-0364416P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADE77617 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Concurrent interrogation of a number of polymorphic sites, genetic testing, carrier screening, genetic profiling, and testing, comprises conducting a multiplexed elongation assumptions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          multiplexed elor
cystic fibrosis
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                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Li AX,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 24-APR-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       probe; ss; negative control; CFTR; human leukocyte antigen; HLA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human probe NEG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  15-OCT-2002; 2002WO-US033012.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     genetic testing; carrier screening;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (BIOA-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           sapiens.
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                             428
18
                                                           16;
                                                                          Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    9;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BIOARRAY SOLUTIONS LTD
                   TTTTATTTTATTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Page
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ting; carrier screening; genotyping; profiling; elongation assay; enzymatic recognition;
                                                                                                                       BP;
                                                          Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    for elongation mediated multiplexed analysis of HLA-DR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Seul M;
                                                                                                                       A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 143pp; English
                                                                        1.5%;
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                             445
                                                          0,
                                                                          Score 14.8; DB 1
Pred. No. 1.8e+03
                                                                                                                       G; 0 T; 0 U; 0 Other;
                                                           Mismatches
                                                                                       Length 18
                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                and identity assay using
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       polymorphic,
                                                          <u>,</u>
                                                           Gaps
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RESULT 2106
ADE84357/c
acid. The genes and/or their regulatory regions are preferably selected from MDR1, CSNK2B, EGR4, AR, CDK4, RB2, CDC25A, GPIb beta, MYOD1, CDH3, CGSTP1, HIC-1, MGMT, MLH1, MOS, MYC, PTEN, RBL2, TGFBR2, TDF3, CDKN1E, CGSTP1, HIC-1, MGMT, MLH1, MOS, MYC, PTEN, RBL2, TGFBR2, TDF3, CDKN1C, CG GST91, HIC-1, MGMT, MLH1, MOS, MYC, PTEN, RBL2, TGFBR2, TDF3, CDKN1C, CG GSK3beta, ESR1, APAF1, BAK1, BAX or HOXA5. Oligomers, peptide nucleic acid (PNA)-oligomers and/or isolated nucleic acids based on the sequences of the genes are useful for detecting the methylation state of all the CG dinucleotides within one or more the sequences, or their complements, for determining the cytosine methylation state and or single nucleotide collicons such as diffuse large B-cell lymphoma, mantle cell lymphoma, conditions such as diffuse large B-cell lymphoma, mantle cell lymphoma, conditions buch as diffuse large B-cell lymphoma, mantle cell lymphoma, conditions of lymphoma subclasses, diagnosis, prognosis, treating and/or monitoring of lymphoid cell proliferative disorder. This sequence represents an oligonucleotide used to analyse of CpG positions within the
                                                                                                                                                                                                                                                                                                                                                                                               between lymphoid cell proliferative disorders associated with at least one gene and/or their regulatory resulpins in a subject by contacting a target nucleic acid in a biological sample obtained from the subject with at least one reagent or series of reagents that distinguish between methylated and non-methylated CDG dinucleotides within the target nucleic methylated and non-methylated CDG dinucleotides within the target nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               dinucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Detecting and differentiating between lymphoid cell proliferative disorders comprises contacting a target nucleic acid with at least one reagent that distinguishes between methylated and non-methylated CpG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         30-MAY-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      methylated CpG dinucleotide; single nucleotide polymorphi diffuse large B-cell lymphoma; mantle cell lymphoma; chronic lymphocytic leukemia; small lymphocytic lymphoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      lymphoid cell proliferative disorder; methylation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human lymphoid cell
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            29-JAN-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADE84357 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 30; SEQ ID NO 353; 448pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    23-NOV-2001; 2001DE-01057491.
28-DEC-2001; 2001DE-01064501.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to a method of detecting and differentiating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-457621/43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WO2003044226-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     follicular lymphoma;
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                                         mentioned
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Caldwell C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first
                                       genes.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  diagnosis; prognosis; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Maier S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CpG analysis oligo #63
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Nimmrich
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Matches

Conservative

0;

Mismatches

Query Match Best Local Similarity

1.5%;

Score 14.8; Pred. No. 1

1.8e+03

Length 18 Indels

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Gaps

0

Sequence 18

BP; 4 A; 1 C; 7

G; 6 T;

0 U;

0 DB 1; Other;

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             diffuse
chronic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    lymphoid cell proliferative usbucce, merhylated CpG dinucleotide; single nucleotide methylated CpG.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human lymphoid cell proliferative disorder gene CpG analysis oligo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       29-JAN-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
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polymorphism;

SNP

#64.

25-NOV-2002; 2002WO-EP013265 30-MAY-2003 WO2003044226-A2

(EPIG-) EPIGENOMICS Caldwell C, ĀG.

Genc

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Becker 'n

Maier

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Nimmrich

23-NOV-2001; 28-DEC-2001;

2001DE-01057491. 2001DE-01064501.

WPI; 2003-457621/43

Detecting and differentiating between lymphoid cell proliferative disorders comprises contacting a target nucleic acid with at least one reagent that distinguishes between methylated and non-methylated CpG

Claim 30; SEQ ID NO 354; 448pp; English

The invention relates to a method of detecting and differentiating CC between lymphoid cell proliferative disorders associated with at least CC one gene and/or their regulatory regions in a subject by contacting a CC target nucleic acid in a biological sample obtained from the subject with CC at least one reagent or series of reagents that distinguish between CC methylated and non-methylated CG dinucleotides within the target nucleic CC acid. The genes and/or their regulatory regions are preferably selected CC from MDR1, CSNK2B, BGR4, AR, CDK4, RB2, CDC25A, GPID beta, MYOD1, CDH3, CC GSTP1, HIC-1, MGMT, MLH1, MOS, MYC, PTEN, RBL2, TGFBR2, TP73, CDKN1C, CC GSTP1, HIC-1, MGMT, MLH1, MOS, MYC, PTEN, RBL2, TGFBR2, TP73, CDKN1C, CC GSK3beta, ESR1, APAF1, BAK1, BAX or HOXA5. Oligomers, peptide nucleic CC of the genes are useful for detecting the methylation state of all the CC Gridinucleotides within one or more the sequences, or their complements, CC conditions such as diffuse large B-cell lymphoma, mantle cell lymphoma, CC chronic lymphocytic leukemia, small lymphocytic lymphoma and follicular CC differentiation between subclasses, diagnosis, prognosis, treating and/or about the methylation state and or single nucleotide conditions and of lymphoid cell proliferative disorder. This sequence mentioned genes.

Sequence 18 B₽; 4 A; 0 C; 7 G; 7 T; 0 U; 0 Other;

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Query Match
Best Local Similarity
Thes 16; Conserva
          Conservative
                1.5%;
         0
        Score 14.8; DB 1
Pred. No. 1.8e+03
0; Mismatches
                         Length 18;
          Indels
          0,
         Gaps
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RESULT

2109

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18

871 TTACAGGCGTGAGCCACC

888 0;

Query Match Best Local Matches

l Similarity

Conservative

1.5%;

Score 14.8; Pred. No. 1

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DB 1;

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                                                  This invention relates to novel isolated polynucleotides with allelic cardiovascular associated (CA) polypeptides, which cardiovascular associated (CA) polypeptides, which cardiovascular disease. Specifically, it refers to methods for cardiovascular disease. Specifically, it refers to methods for that diagnose a predisposition or susceptibility for cardiovascular can be consisted as predisposition or susceptibility for cardiovascular can be consisted as probes for the detection describes specific CA genes that can be consisted as probes for the detection of genetic polymorphisms. Furthermore, consisted as probes for the detection of genetic polymorphisms. Furthermore, consisted as probes for the detection of genetic polymorphisms. Furthermore, consisted the used for treating cardiovascular disease such as elevated low can be used for treating cardiovascular disease such as elevated low consisty lipoprotein (LDI)-cholesterol levels, high blood pressure.

CA such, they can be described as having cardiant, cerebroprotective, antiatheroscierotic or hypotensive activities. This oligonuclostide sequence is a PCR primer used for amplifying human beta-migrating cardiovascular disparation of the plasminogen activator inhibitor 1 (SeqID 2) DNA, a CA gene of the
                                                                                                                                                                                                                                                                                                                                                                                              Novel isolated polynucleotide encoded by cardiovascular associated gene, useful for treating cardiovascular disease e.g., high blood pressure, myocardial infarction, stroke, atherosclerosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       beta-migrating plasminogen activator inhibitor 1; PCR; primer; 88; cardiovascular associated; CA; atherosclerosis; ischaemia; hypertension; restenosis; cardiant; cerebroprotective; antiatherosclerotic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADF17789;
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Sequence 18
                                                                                                                                                                                                                                                                                                                                                              Example; Page 20; 40pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Stropp
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    15-JAN-2002; 2002EP-00000253
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   restenosis; cardiant; cerebroprotective;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (FARB ) BAYER AG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Schwers S,
   BP; 4
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                                                                                                                                                                                                                                                                                                                                                                  English.
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   <u>ი</u>
   5 T; 0
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     0 Other;
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RESULT 2110
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ID ACA8889
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XX O8-JUL-
XX DE Selecti
XX Geneti
XX Genesi
XX Homo si
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Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel nucleic acid molecule comprising a matrilin-3 gene, or its fragment or variant, a sequence of 137870 bp fully defined in the specification, and at least one polymorphism given in the specification. A protein of the invention has osteopathic activity. A polymucleotide of the invention may have a use in gene therapy. The composition and methods of the invention are useful in diagnosing, prognosing or treating osteoarthritis using polymorphisms in the matrilin-3 gene. The present sequence is used in the exemplification
                                                                                   Genetic marker selection; multiplex PCR amplification; prenatal diagnostic testing; foetal sex determination; genetic identification; DNA profiling; DNA fingerprinting; forensic analysis; PCR; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New nucleic acid molecule for diagnosing, prognosing or treating osteoarthritis comprises a matrilin-3 gene or its fragment or variant, and at least one polymorphism.
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                                  Homo sapiens
                                                                                                                                                                                                                             Selection and
                                                                                                                                                                                                                                                                                                                                                                                               ACA88892 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Disclosure; SEQ ID NO 123; 190pp; English.
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05-DEC-2002; 2002US-0431538P
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16; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention describes a method of selecting genetic markers as targets for nucleic acid sequence amplification comprising selecting each of the genetic markers according to a heterozygosity index of 0.5 or greater. Selecting and amplification of genetic markers are useful as targets for nucleic acid sequence amplification, for genetic testing or facilitating multiplex PCR amplification from limiting amounts of target nucleic acid. The methods are also useful for improving genetic diagnostic and screening methods, such as prenatal diagnostic testing, foetal sex determination or genetic identification, e.g. DNA profiling or DNA fingerprinting. The nucleic acid sequence amplification is also useful in forensic analysis of degraded, old, ancient and difficult samples that are difficult to amplify and identify. This sequence represents a PCR primer used in the selection and amplification of genetic markers
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ADG31947
31-MAY-2002; 2002JP-00158853.
12-JUL-2002; 2002JP-00204143.
                                                                                                                                                                                                                                                                                                                                                     DNA/RNA hybrid; ss; genotyping; gene polymorphism; single nucleotide polymorphism; SNP; cytochrome CYP2C19; cytochrome CYP1A1; glutathione-5-transferase; aldehyde d ALDH2; PCR; primer; GSTM1; GSTT1.
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12-OCT-2001;
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                                                                                                                                                                                                                                                                                           Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   RNA/DNA hybrid PCR primer used to amplify human
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2001AU-00008235.
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Matches 16
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25-OCT-2002; 2002JP-00310862.
19-NOV-2002; 2002JP-00335830.
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                                    WPI; 2004-035466/03
                                                                                                                               30-MAY-2003;
                                                                                                                                                                                                                                                                            22-APR-2004
Amplifying for RNA in a sample, useful for improving RNA polymerase based RNA transcription from a polynucleotide template, comprises eliminating
                                                                                                          31-MAY-2002;
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                                                                                                          2002US-0384454P
                                                                                                                                2003WO-US017103.
                                                                                                                                                                                                                           amplification; RNA transcription; RNA polymerase;
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                                                                                                                                                                                                 to form a transcription sample containing a cDNA template; eliminating single-stranded oligonucleotide from the transcription sample; and transcribing the cDNA template into RNA using an RNA polymerase. The method is useful for improving RNA polymerase based RNA transcription from a polynucleotide template. The method inhibits the undesired non-template derived production of RNA in the transcription reaction. Sequences ADI34483-ADI34489 represent oligonucleotides used in a T7 RNA
                                                                                                                                                                                                                                                                                                              sample. The method involves symmetries transcriptase and an incubating the sample RNA with reverse transcriptase and an oligonucleotide primer that primes synthesis in a direction toward 5' of the RNA; converting the single-stranded cDNA into double-stranded of the RNA; converting the single-stranded cDNA template; eliminating
                                                                                                                                                                                                                                                                                                                                                                                   eliminating single-stranded oligonucleotide from the transample. The method involves synthesizing single-stranded
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                                                                                                                                             Sequence 18
                                                                                                                                                                                  transcription reaction.
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                                                                                          88.98;
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 18
                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                          plifying for RNA in a sample comprises oligonucleotide from the transcription
                                                                                                                                               G;
                                                                                      Score 14.8; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  English
                                                                                                                                               18 T; 0 U;
                                                                        Mismatches
                                                                                                             DB 1;
                                                                                                                                                 0 Other;
                                                                                                           Length 18;
                                                                          Indels
                                                                          0
                                                                          Gaps
                                                                                                                                                                                                           RNA
                                                                                                                                                                                                                                                                                                                                         CDNA
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RESULT 2113
                                                                            Unidentified
                                                                                                                                 melanin-concentrating
                                                                                                                                                                          MCHR1 genomic sequence analysis primer #70
18-DEC-2003
                                      WO2003104489-A2
                                                                                                               obesity; primer;
                                                                                                                                                                                                                22-APR-2004
                                                                                                                                                                                                                                                      ADH76761;
                                                                                                                                                                                                                                                                                           ADH76761 standard;
                                                                                                                                                                                                                (first entry
                                                                                                                                                                                                                                                                                             DNA; 18
                                                                                                                                   hormone receptor 1; MCHR1; anorectic; gene therapy;
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05-JUN-2002; 2002EP-00012569

(UYPH-) UNIV PHILIPPS MARBURG

05-JUN-2003;

2003WO-EP005917.

Platzer M, Reichwald

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Platzer

ņ

Gudermann

'n

Hebebrand

Ġ,

Hinney

×

WPI;

2004-062377/06

The polynucleotide composition comprises: a sequence encoding a polypeptide with defined sequences given in the specification; a secapable of hybridizing to a melanin-concentrating hormone receptor

invention relates to a novel diagnostic polynucleotide

composition.

a sequence

capable of hybridizing to a melanin-concentration of the michel polypeptide; (MCHR1) gene; a polymucleotide encoding an MCHR1 polypeptide; (MCHR1) gene; a polymucleotide exchanges (sequence comprising one or more of the nucleotide exchanges (sequence).

nucleotide exchanges (SNP's)

얁

given f the

the specification

Example

2; Page 43;

76pp;

English

the disorder.

New diagnostic composition, useful presence of a molecular variant of

the

diagnosing obesity related to t MCHR1 gene or a susceptibility

y to

ពួកព័ត្ត ពួកព័ត្ត និង្គ

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RESULT 2114
ADH76763
The invention relates to a novel diagnostic polynucleotide composition.

The polynucleotide composition comprises: a sequence encoding a polynucleotide with defined sequences given in the specification; a sequence capable of hybridizing to a melanin-concentrating hormone receptor 1 (MCHR1) gene; a polynucleotide encoding an MCHR1 polypeptide; or a sequence comprising one or more of the nucleotide exchanges (SNP's) given in the specification and at least 8 bases of surrounding sequence of the MCHR1 gene. The composition has anorectic activity. The polynucleotide composition may be used in gene therapy to treat the disorders of the invention. The composition is useful for diagnosing obesity related to the presence of a molecular variant of the MCHR1 gene or a susceptibility to the disorder. The MCHR1 protein or polynucleotide is useful for presenting a medicament for treating or preventing obesity related to the presence of a molecular variant of the MCHR1 gene. This polynucleotide represents an MCHR1 primer of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           composition may be used in gene therapy to treat the disorders of the invention. The composition is useful for diagnosing obesity related to the presence of a molecular variant of the MCHR1 gene or a susceptibility to the disorder. The MCHR1 protein or polynucleotide is useful for preparing a medicament for treating or preventing obesity related to the presence of a molecular variant of the MCHR1 gene. This polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18 BP; 4 A; 2 C; 7 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Platzer M,
Reichwald K;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADH76763 standard; DNA; 18 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             MCHR1 gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 2; Page 43; 76pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New diagnostic composition, useful presence of a molecular variant of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2004-062377/06
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (UYPH-) UNIV PHILIPPS MARBURG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            05-JUN-2002; 2002EP-00012569
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       05-JUN-2003; 2003WO-EP005917
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO2003104489-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           obesity; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       melanin-concentrating hormone receptor 1; MCHR1; anorectic; gene therapy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     MCHR1 genomic sequence analysis primer #72.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    22-APR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        represents an MCHR1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              disorder.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  867 GGGATTACAGGCGTGAGC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          GGTATTACAGGTGTGAGC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   The composition has anorectic activity. The polynucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Platzer C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        primer of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Gudermann
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  884
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 14.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Hebebrand J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    diagnosing
MCHR1 gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       obesity related to the or a susceptibility to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Hinney A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0
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Sequence 18 BP; 2 A;

5 C;

5 G;

6 T;

0 U; 0 Other;

Query Match Best Local Similarity

1.5**%**; 88.9%;

Pred. No. Score 14.8;

1.8e+03;

DB 1;

Length 18;

Sequence 18

BP; 18

A; 0

C; 0

G; 0 T; 0 U; 0 Other,

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RESULT 2115
ADH78590/c
ID ADH7859
XX ADH7859
XX ADH7859
밁
                                   The invention relates to a method of determining a functional property of a fluid in a chamber comprising introducing into the chamber a support to CC which is bound several test elements, each of the test elements CC comprising a reaction domain and a detection domain, introducing into the Cc chamber a fluid that is interactive with the reaction domains, removing CC the locations at which the fluid has not interacted with the reaction CC domains, and relating the locations to the functional property of the CC comprises a member of a specific binding pair. The detection domain cCC comprises a member of a specific binding pair. The detection all property is CC chosen from the flow pattern of the fluid. The functional property is CC chosen from the flow pattern of the fluid, reagent distribution within CC useful and time dependent reactivity of the fluid. The method is useful for determining a functional property of a fluid in a chamber and CC for synthesising arrays of biopolymers e.g., arrays of polynucleotides. CC method provides for the characterisation of a new fluid/flow cell combination. This sequence represents a test element used in the method of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Fluid
fluid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ADH78590;
                                                                                                                                                                                                                                                                                                                                                                                                         Determining a functional property of fluid in chamber by introducing a support comprising test elements having reaction and detection domains, introducing a test fluid, and detecting locations not reactive with the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Test element oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       22-APR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADH78590 standard; DNA; 18 BP
                                                                                                                                                                                                                                                                                                                                                              Example 2; SEQ ID NO 2; 22pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2004-061269/06
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (LEPR/)
(AMOR/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   14-JUN-2002; 2002US-00172675
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  14-JUN-2002; 2002US-00172675
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                US2003232343-A1
                              of the
                                                                                                                                                                                                                                                                                                                                                                                             fluid.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (PECK/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 18-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1114 GCTGGTCTCAAACTCCTG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         functional property; fluid flow pattern; reagent distribution; time dependent fluid reactivity;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  \vdash
                              invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AMORESE D A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PECK B J.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         EM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  GCTGGTCTTGAACTCCTG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Amorese
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Peck BJ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1131
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 14.8; D
Pred. No. 1.8e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB 1;
.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              88
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RESULT 2:
ADI20814
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                                                                                     The present invention relates to detecting the methylation state of the CC contacting a target nucleic acid having one or more sequences selected CC from 5 3581 base pair sequences in a biological sample with at least one reagent or a series of reagents. The method is useful for detecting the CC methylation state of the 5 and promoter region of the gene DB within a CC subject. The set of oligonucleotides comprising at least three of the CC oligoners is useful for detecting the cytosine methylation state and/or single nucleotide polymorphisms (SNPs) within SEQ. ID NO. 1-5 and its complementary sequences. The set of oligoners is also useful for detecting the methylation state of all CpG dinucleotides within SEQ ID CC oligonucleotides can be used as primer oligonucleotides within SEQ ID CC amplification of DNA sequences. The set of all CpG dinucleotides for the CC complementary sequences selected from SEQ ID NO. 1-5 and its complementary sequences selected from SEQ ID NO. 1-5 and its complished to sequences selected from SEQ ID NO. 1-5 and its comprising at least one nucleic acid. The methylation state of the gene DD3 comprising diseases associated with the methylation state of the gene DD3 coligonucleotide or PNA-oligomer, kit, array or the set of oligonucleotides is useful for the characterization, classification, classification, grading, staging, and/or diagnosis of cell proliferative disorders. The present sequence represents a detection oligonucleotide of the invention.
Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Detecting methylation of 5' and promoter region of DD3 gene for diagnosing proliferative disorders comprising contacting targe acid with a reagent that distinguishes between methylated and methylated CpG dinucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Horns
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           08-JUL-2002; 2002DE-01030692
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15-JAN-2004.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DD3; CpG dinucleotide; cell proliferative disorder;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Hybridisation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        06-MAY-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ADI20814;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ADI20814 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2004-091385/09
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-JUN-2003; 2003WO-EP006690
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO2004005543-A1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 6;
                                                               Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (EPIG-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      2116
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    428
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  16;
   16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              EPIGENOMICS
                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TTTTATTTTATTTTTTT
                                                                 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    SEQ ID NO 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                               BP; 3 A; 0 C; 1 G; 14 T; 0 U; 0 Other;
   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          detection oligonucleotide #12
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Ą
                  88.9%;
                                   1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 56pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ΒP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    445
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   0,
                    Pred. No.
                                 Score 14.8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mismatches
   Mismatches
                    1.8e+03
                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       <u>ب</u>
   2;
                               Length 18;
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161

AATTTTGTATTTTTTTT

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RESULT 2117
ADM46455/c
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The invention relates to an antisense oligonucleotide targeting human CC intercellular adhesion molecule (ICAM-1) having a sequence appearing as CC ADM46473. In the oligonucleotide, at least one adenosine nucleotide is complaced with a thymidine, cytidine or guanosine nucleotide, at least one thymidine or cytidine or guanosine nucleotide, at least one cadenosine, thymidine or cytidine or guanosine nucleotide is replaced with an adenosine, cytidine or guanosine concleotide, the providence of the sequence of the sequence of the cytidine or guanosine concleotide is replaced with an adenosine, cytidine or guanosine concleotide. The oligonucleotide is one of 88 disclosed antisense concleotide. The oligonucleotide is one of 88 disclosed antisense concleotide is replaced with an adenosine, cytidine or guanosine concleotide. The oligonucleotide is one of 88 disclosed antisense concleotide is compound the sequence of adhesion molecule (VCAM-1) compound 8-80 nucleobases in length targeted to human ICAM-1 mRNA compound specifically hybridises with the human ICAM-1 mRNA confidence is useful for modulating the activity of the RNA and DNA confidence is useful for modulating the activity of the RNA and DNA confidence of the synthesis and metabolism of specific cell adhesion molecules. It is also useful for the diagnosis, as research confidence is suitable for treating inflammatory ophthalmological disorders including redness and inflammatory ophthalmological disorders including redness and inflammatory ophthalmological
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14-AUG-1990;
02-SEP-1992;
21-JAN-1993;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ÷.7
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                                                                                                                                                                                                                                                                                                                                                                                                                New antisense oligonucleotide, useful for diagnosing, as research reagents and for treating disease states, which respond to modulation the synthesis or metabolism of cell adhesion molecules.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 endothelial leukocyte adhesion molecule; ELAM-1; inflammatory ophthalmological disorder; redness;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Antisense; ss; human; intercellular adhesion molecule;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   03-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADM46455;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2004-180090/17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Bennett
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (BENN/)
(MIRA/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 03-AUG-1998;
12-SEP-2000;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  04-JUN-2003; 2003US-00454663
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    US2004033977-A1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 corneal explant;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   vascular
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Antisense oligonucleotide targeting
                                                                                                                                                                                                                                                                                                                                                                                   Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   10-FEB-1993;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   18-OCT-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   12-MAY-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17-MAY-1993;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BENNETT C
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AATTTTTTATGTTTTTT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SEQ ID NO 4; 72pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 98US-00128496.
2000US-00659288.
2001US-00982262.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mirabelli
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93US-00007997.
93US-00969151.
93US-00063167.
95US-00440740.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   adhesion molecule; VCAM-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   90US-00567286
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     corneal allogratt
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   O A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       rejection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    human ICAM-1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      #4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ICAM-1;
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Length

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RESULT 2118
ADNO8321
The invention relates to a novel isolated human protein for promoting the transformation of 3T3 cells and contains any of the 31 amino acid sequences defined in the specification. The invention further provides: an isolated polynucleotide that encodes any of the proteins described above; a vector containing any of the said polynucleotides; a host cell for genetic engineering, which is transformed or transduced by the polynucleotide or vector described above; a process for producing the product; and an antibody binding specifically with the CC numan protein. The 3T3 transformation promoting human protein has cytostatic activity. The protein and its encoded polynucleotide are useful for promoting the transformation of 3T3 cells, together with CC expression vectors and transformants for the transent of disorders, such as cancer. This polynucleotide sequence represents a primer for the CC DNA encoding one of the 3T3 transformation promoting human proteins of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local &
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human protein for promoting transformation of 3T3 cells and its encoded polynucleotide, applicable in producing recombinant proteins and in gent therapy of e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              07-AUG-2002; 2002CN-00136401.
16-SEP-2002; 2002CN-00136998.
16-SEP-2002; 2002CN-00136999.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Example 2; SEQ ID NO 21; 68pp; Chinese.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2004-330446/30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              07-AUG-2003; 2003WO-CN000636.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    22-APR-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     recombinant
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 transformation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     3T3 cell transformation promoting human DNA primer,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ADN08321;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADN08321 standard; DNA; 18 BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 3T3 cell;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  genetic engineering; cytostatic;
therapy; cancer; human; ss; prim
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); Mismatches
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Pred. No. 1.8e+03;
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Sequence 18 BP;

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993 CCCGGGCTCAAGCGATTC 1010

Query Match Best Local Matches

16;

Conservative

<u>,</u>

Mismatches

Indels

0,

Gaps

0,

Similarity

88.9%;

Score 14.8; Pred. No. 1.

.8e+03

DB 1;

Length 18;

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RESULT 2119
ADN02345/c
ID ADN0234
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Best Local Similarity
Matches 16; Conserv
                                                                              of a late-onset neurodegenerative disease to a patient which comprises analysing a sample from the patient to determine whether the patient has a D-amino acid oxidase (DAO) abnormality, where the presence of a DAO abnormality is an indication that the patient has an increased risk of the late-onset neurodegenerative disease. DAO is a flavin dinucleotide (FAD)-dependent oxidase which catalyses the oxidative deamination of D-amino acids (EC.1.4.3.3). The method of the invention has neuroprotective and antiparkinsonian applications and may be useful in determining an increased risk of a late-onset neurodegenerative disease to a patient, as well as in preparing a medicament for treating a late-onset neurodegenerative disease (DA), or Albertmer's disease (DA) or Albertmer's disease (DA) or Albertmer's disease (DA)
                                                                                                                                                                                                                                                                                                                                                          Determining an increased risk of a late-onset neurodegenerative disease to a patient comprises analyzing a sample from the patient to determine whether the patient has a D-amino acid oxidase (DAO) abnormality.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           flavin dinucleotide; FAD-dependent oxidase;
D-amino acid oxidative deamination; EC.1.4.3.3; neuroprotective;
antiparkinsonian; amyotrophic lateral sclerosis; ALS; Parkinson's;
Alzheimer's; gene therapy; human; ss; PCR; primer; linkage analysis;
Sequence 18
                               Parkinson's disease (PD) or Alzheimer's disease (AD), possibly via therapy. The current sequence is that of a PCR primer of the invent which was used during linkage analysis of human D-amino acid oxidate.
                                                                                                                                                                                                                                                                                                                            Example 1; SEQ ID NO 73; 209pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              09-OCT-2002; 2002GB-00023424
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 06-OCT-2003; 2003WO-GB004337.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WO2004033723-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    PCR primer 64 used during linkage analysis of human D-amino acid oxidase.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ADN02345;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADN02345 standard; DNA; 18
                                                                                                                                                                                                                                                                                       The invention relates to a novel method for determining
                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2004-348204/32
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                chromosome 12.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    late-onset neurodegenerative disease; D-amino acid oxidase;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          661
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BP; 5 A; 5 C; 5 G; 3 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       De
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            COLLEGE INNOVATIONS LTD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          678
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 14.8; DB 1;
Pred. No. 1.8e+03;
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 0 Other;
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                                     oxidase
                                                      ly via gene invention
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CCTGGGTTCAAGCGATTC 1

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CC synthesis primer to RNA, separating the cDNA with an adaptor through 5'-phosphate on strand (II) of the adaptor through 5'-phosphate on strand (II) of the adaptor to single comediated using DNA ligase, and amplifying the obtained ligated single stranded fragment in an molecular amplification procedure. The method is coseful for: synthesising a single stranded cDNA by a 5'-ligated adaptor-comediated process, where the source of nucleic acid is chosen from blood, comediated process, where the source of nucleic acid is chosen from blood, complify the cDNAs corresponding to the mRNAs collection of mRNA molecules in a sample, where the method is collection of mRNA molecules in a sample, where the method is applied to complify the cDNAs corresponding to the mRNAs by annealing one or more containing single stranded cDNA (sense) by use of streptavidin coated manks collection from a first mRNA population by the method, containing single stranded cDNA (sense) by use of streptavidin coated magnetic beads, synthesising a double-stranded cDNA collection from a second mRNA population according to the method, isolating the biotin-containing single stranded cDNA (anti-sense) by use of streptavidin coated magnetic beads, hybridised sub-population of the anti-sense cDNA is found. CC isolating the unhybridised sub-population of the anti-sense cDNA by use of streptavidin coated cDNA, and generating a second double-stranded cDNA collection from the unhybridised sub-population by CR using primer 1 and population. The method is an improved method for producing amplified containing single stranded cDNA collection single stranded cDNA.

CC production single stranded cDNA is a per-selected cell collection acid. This sequence represents a poly-A-tail used to in the collection single stranded cDNA.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              primer to RNA and synthesize single stranded cDNA using stranded cDNA fragment.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Synthesizing single stranded cDNA, involves annealing cDNA synthesis primer to RNA and synthesizing first cDNA strand, ligating adaptor to single stranded cDNA using DNA ligase, and amplifying ligated single
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    single stranded cDNA; adaptor-mediated process; cDNA synthesis; poly-A-tail; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Single stranded cDNA production poly-A-tail seqid 6.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention describes a method of synthesising single stranded a 5' ligated adaptor-mediated process involving: annealing a CDNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 1; SEQ ID NO 6; 22pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2004-326403/30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Thirstrup K,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        22-AUG-2000; 2000US-0226954P
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Sequence 18 BP; 18 A; 0 C; 0 G; 0 T; 0 U; 0 Other;

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RESULT 2121
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Best Local S
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                                                                                                                                                                                                                                                                                     single stranded
poly-A-tail; ss.
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                                                                                                                                                                                                                                                                          Synthetic
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                                                                                                                                                                                                         Thirstrup K,
                                                                                                                                                                                                                   (AZIG-) AZIGN BIOSCIENCE AS
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                                                                                                                                                                                                                                                                                                                                                                  18 TTTTTTTTTTTTTTTT
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                                                                                                                                                                                                         Warthoe
                                                                                                                                                                                                                                                                                           cDNA; adaptor-mediated process; cDNA synthesis;
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                                                                                                                                                                                                         Pettersson NB;
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Pred. No. 1
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Synthesizing single stranded cDNA, involves annealing cDNA synthesis primer to RNA and synthesizing first cDNA strand, ligating adaptor to single stranded cDNA using DNA ligase, and amplifying ligated single stranded cDNA fragment.

CDNA γd

Example 1; SEQ ID NO 7; 22pp; English

The invention describes a method of synthesising single stranded cDNA by CC a 5'-ligated adaptor-mediated process involving: annealing a cDNA CC synthesis primer to RNA, separating the cDNA strand from the RNA, CC purifying the cDNA, contacting the cDNA with an adaptor, ligating the CC stranded wing DNA ligase, and amplifying the obtained ligated single CC stranded fragment in an molecular amplifying the obtained ligated single CC serum, plasma, cerebrospinal fluid, urine, tissue samples, biopsies and CC saliva. The tissue sample comprises a cell population which may be single collection of mRNA molecules in a sample, where the method is applied to collection of mRNA molecules in a sample, where the method is subtractive hybridisation probe which involves synthesising a constaining single stranded cDNA synthesis primers to several mRNAs in the sample, producing a complify the cDNAs corresponding to the mRNAs by annealing one or more containing single stranded cDNA (collection from a first mRNA population by the method, where primer 1 is modified by biotin in the 5' end, isolating the biotin-coated magnetic beads, synthesising a double-stranded cDNA collection from a second mRNA population according to the method, isolating the mon-biotin-coated magnetic beads, hybridising to the method, isolating the mon-biotin-coated magnetic beads, hybridising to the method, isolating the mon-biotin-coated magnetic beads, hybridising to the method, isolating the mon-biotin-coated magnetic beads, hybridising the sense to the anti-sense cDNA, where cDNA, and generating a second double-stranded cDNA collection from a second mRNA population of the anti-sense cDNA by use of streptavidin coated cDNA, and generating a second double-stranded cDNA collection from the unhybridised sub-population of the anti-sense cDNA by use of streptavidin coated cDNA, and generating a second double-stranded cDNA collection from the unhybridised sub-population of the anti-sense cDNA by use of streptavidin coated cDNA collection from the unhybridised s

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ADO81024/c
II ADO810
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Best Local S
Matches 16
                                                                                      amplification of at least one DNA region of (I) that includes PML, using as template a DNA sample containing at least one segment of (I), and determining the length of the resulting amplicon(s). Also described are: a method of determining (M2) microsatellite markers (MM) for predisposition to a disease, associated with a gene that includes one or more PML; and predisgnosis (M3) of diseases associated with gene that include PML. The method is used to identify microsatellite markers, in a disease-related gene, that are associated with a predisposition to diseases and for prediagnosis of such diseases, especially prion diseases but also cystic fibrosis, malignant hyperthermia syndrome in pigs and metabolic diseases; also to type genes that encode milk proteins, hormones or transcription factors. The method is simpler, quicker and particularly less expensive than known methods based on sequencing. This
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer 2; and detecting expression of a gene in a pre-selected cell population. The method is an improved method for producing amplified heterogeneous populations of cDNA from limited quantities of RNA or nucleic acid. This sequence represents the complement of a poly-A-ta
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Typing genes that contain polymorphic microsatellite loci, useful for identifying predisposition to disease, by amplification and determining length of amplicons.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       gene typing; polymorphic microsatellite loci; PML; disease predisposition; microsatellite market; prion disease; cystic fibrosis; malignant hyperthermia syndrome, metabolic disease; milk protein; hormone; transcription factor; pT7-blue-vector; human;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    The invention describes a method of typing (M1) a gene (I) that has one or more polymorphic microsatellite loci (PML). The method comprises: PCI
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 3;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     09-AUG-2002; 2002DE-01036711
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human prion
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                                 represents a primer used to genotype a region of the human prior (PrP) comprising a polymorphic microsatellite locus.
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CC phenotypic preferences in test organisms or parts, where the test constraint and comparism of interest and organisms that are related to the organisms of interest; CC and (b) replacing the first codon with the synonymous codon to construct the synthetic polymucleotide. Also described: (1) a method for CC determining the phenotypic preference of a first codon in an organism of interest or its parts; (2) a synthetic polymucleotide constructed from the method above; (3) an organism or interest or part containing a synthetic constructed from CC synthetic polymucleotide constructed from the method above; (4) an CC organism or interest or part containing a synthetic construct that CC of a first codon fused in frame with a reporter polymucleotide that CC of a first codon fused in frame with a reporter polymucleotide that CC encodes a reporter protein, which produces, or is predicted to produce a constructed phenotype or a phenotype of the same class as the selected phenotype that is displayed by an organism of interest or part condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the condess the polypeptide; (6) a method of enhancing the quality of a selected phenotype that is displayed by an organism of interest or part the con
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Best Local Similarity
Matches 16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 quality than that conferred by a parent polynucleotide that encodes the same polypeptide. The method comprises: (a) selecting a first codon of the parent polynucleotide for replacement with a synonymous codon, where the synonymous codon is selected on the basis that it exhibits a different phenotypic preference than the first codon in a comparison of the parent phenotypic preference than the first codon in a comparison of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 18 BP; 3 A; 2 C; 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Constructing synthetic polynucleotide for modulating the quality of a selected phenotype displayed by an organism comprises replacing a first codon with a synonymous codon to construct the synthetic polynucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Synthetic
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            polymucleotide from which a polypeptide is producible to confer a selected phenotype to an organism of interest or part in a different
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 1; SEQ ID NO 77; 86pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2004-411519/38.
P-PSDB; ADO26685.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Synthetic leader sequence encoding DNA SEQ ID NO:77.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADO26684 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention describes a method for constructing a synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (UYQU ) UNIV QUEENSLAND
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Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               English.
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ADO26682/
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local :
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The present invention describes a method for constructing a synthetic polynucleotide from which a polypeptide is producible to confer a selected phenotype to an organism of interest or part in a different quality than that conferred by a parent polynucleotide that encodes the same polypeptide. The method comprises: (a) selecting a first codon of the parent polynucleotide for replacement with a synonymous codon, where the synonymous codon is selected on the basis that it exhibits a different phenotypic preference than the first codon in a comparison of phenotypic preferences in test organisms or parts, where the test organism are selected from organisms of the same species as the organism of interest and organisms that are related to the organisms of interest; and (b) replacing the first codon with the synonymous codon to construct the synthetic polynucleotide. Also described: (1) a method for determining the phenotypic preference of a first codon in an organism of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 18 BP; 0 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Constructing synthetic polynucleotide for modulating the quality of a selected phenotype displayed by an organism comprises replacing a first codon with a synonymous codon to construct the synthetic polynucleotide.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 1; SEQ ID NO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (UYQU ) UNIV QUEENSLAND
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DB; ADO26683.
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16; Conserv
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Pred. No. 1.
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                                                                                                                      CC the method above; (3) an organism or interest or part containing a cc synthetic polynucleotide constructed from the method above; (4) an CC synthetic polynucleotide constructed from the method above; (4) an CC organism or interest or part containing a synthetic construct that CC comprises a regulatory polynucleotide operably linked to a tandem repeat CC encodes a reporter protein, which produces, or is predicted to produce a CC selected phenotype or a phenotype of the same class as the selected CC phenotype in the organism or part; (5) a method of modulating the quality of a selected phenotype that is displayed by an organism of interest or CC part and that results from the expression of a parent polynucleotide that CC encodes the polypeptide; (6) a method of enhancing the quality of a cleeted phenotype that is displayed by an organism of interest or part and that results from the expression of a parent polynucleotide that CC encodes the polypeptide; and (7) a method of reducing the quality of a cleeted phenotype that is displayed by an organism of interest or part CC and that results from the expression of a parent polynucleotide that CC encodes the polypeptide. The method of aparent polynucleotide that CC encodes the polypeptide. The method is useful for constructing a CC synthetic polynucleotide that encodes the polypeptide. The method is useful for constructing a cc selected phenotype to an organism of interest or part in a different CC asset polynucleotide to an organism of interest or part in a different CC entered by an organism of interest or part in a different CC entered by an organism of interest or part in a different CC entered by an organism or part. The present sequence encodes content of the conten
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      interest or its parts; (2) a synthetic polynucleotide constructed the method above; (3) an organism or interest or part containing;
Sequence 18 BP; 18 A; 0 C; 0 G; 0 T; 0 U; 0 Other;
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RESULT 2125
ADP45818
ID ADP4581
XX ADP4581
XX DF4581
XX DF688
DT 26-AUG-
XX Interce
KW L54; c
KW LANGSte
KW CD54; c
KW S8; pri
XX SHOMO S8
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Best Local !
                                                                                                                                                                                                                                                                               intercellular adhesion molecule; ICAM-1; human rhinovirus receptor; HHZ; CD54; cell surface glycoprotein P3.58; ICAM-4; Landsteiner-Wiener blood group; ICAM-5; telencephalin; chromosome 19p13;
                                                                                                                                                                                                                                                                   ss; primer; PCR; SNP; single nucleotide polymorphism; probe
                                                                                                                                                                                                                                                                                                                      breast cancer; cytostatic; gene therapy;
                                                                                                                                                                                                                                                                                                                                             Extend primer 10 used to genotype human ICAM-1/ICAM-4/ICAM-5
                                                                                                                                                                                                                                                                                                                                                                        26-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                               ADP45818
                                                                                                                                                                                                                                                                                                                                                                                                                        ADP45818 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Local
                                                                                                                                                                                                                                          sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   al Similarity
16; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    18
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               445
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Mismatches
                                                                                                                                                                                                                                                                                                      therapy; human; ICAM-1; human rhinovirus receptor; BB2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   .8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Indels
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Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPK10, KIAA0861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample

of polymorphic

WPI; 2004-441051/41.

25-NOV-2002; 2002US-0429136P. 24-JUL-2003; 2003US-0490234P. 25-NOV-2003; 2003WO-US037948

(SEQU-)

SEQUENOM INC Nelson MR,

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Kammerer

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Reneland

WO2004047623-A2

10-JUN-2004.

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RESULT 2126
ADP86130
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local S
Matches 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current sequence is that of an Extend primer (also described as probe) of the invention which was used to genotype human intercellular adhesion molecule ICAM-1/ICAM-4/ICAM-5 gDNA. ICAM-1 (human rhinovirus receptor;BB2 ;CD54;cell surface glycoprotein P3.58) has been mapped to chromosomal position 19p13.3-p13.2, ICAM-4 (Landsteiner-Wiener blood group;LW) has been mapped to chromosomal position 19p13.2-cen and ICAM-5 (telencephalin) has been mapped to chromosomal position 19p13.2-cen and ICAM-5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The invention relates to a novel method for identifying a subject at risk of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 4; Page 83; 289pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     CpG immunostimulatory oligonucleotide; immune response; allergy; asthma; viral infection; bacterial infection; cancer; lymphoma; intraepithelial neoplasm; melanoma; neuroblastoma; Hodgkin's lymphoma; carcinoma; sarcoma; gene therapy; phosphorothioate; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 18 BP; 4 A; 2 C; 7 G; 5 T; 0 U; 0 Other;
                      New oligonucleotides, useful for treating allergy or asthma, viral and bacterial infections, and cancer, e.g. biliary tract cancer, breast
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               CpG immunostimulatory
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 09-SEP-2004
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                                                                                                                         WPI; 2004-487902/46.
                                                                                                                                                                                                                                                                                                                                              11-DEC-2002; 2002US-0432409P.
25-SEP-2003; 2003US-0506108P.
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                                                                                                                                                                                                                                                  COLEY PHARM GROUP COLEY PHARM GMBH.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
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                                                                                                                                                                                    Jurk M,
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/mod_ba
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   base= OTHER
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               "Phosphorothioate backbone"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 14.8; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                       Uhlmann
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
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The invention relates to a class of CpG immunostimulatory oligonucleotides containing a 5'TCG motif or a CG at or the 5' end that are useful for stimulating an immune response. Oligonucleotides and compositions of the invention are useful for treating allergy or asthma, viral and bacterial infections and cancer e.g. biliary tract cancer, viral and bacterial infections and cancer e.g. biliary tract cancer, present cancer, carvical cancer, choriocarcinoma, colon cancer, endometrial cancer, gastric cancer, lymphomas, intraepithelial neoplasms, liver cancer, lung cancer (e.g. small cell and non-small cell), melanoma, neuroblastomas, ovarian cancer, pancreatic cancer, prostate cancer, rectal cancer, sarcomas, thyroid cancer, renal cancer, bone cancer, brain and CNS cancer, sarcomas, thyroid cancer, oesophageal cancer, becancer, Hodgkin's lymphoma, larynx cancer, oral cavity cancer, skin cancer, testicular cancer, as well as other carcinomas and sarcomas. The
Sequence 18 BP; 0 A; 0 C; 0 G; 18 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Example;
                                                                                               invention is also useful in gene therapy. The present sequence is a CpG immunostimulatory oligonucleotide.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               SEQ ID NO 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    104pp; English
0 Other;
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RESULT 2127
ADQ30328
                                                                                                                                                                                                                                                                                                                                                                                                                          Best Loc
Matches
                                                                ds; VR1 receptor; vanilloid receptor type 1; modulator; pain transmission; primary sensory neuron; transcription factodetection; MZF1; NFkappaB; NFAT; GATA1; sensitivity disorder; hypalgesia; hyperalgesia; neuralgia; myalgia; human.
WO2004053120-A2
                                Homo
                                                                                                                                                      Human VR1 exon 1d transcription factor binding fragment
                                                                                                                                                                                            09-SEP-2004 (first entry)
                                                                                                                                                                                                                               ADQ30328;
                                                                                                                                                                                                                                                                  ADQ30328
                                                                                                                                                                                                                                                                                                                                                                                       428
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                                                                                                                                                                                                                                                                                                                                                                                TTTTATTTTATTTTTTT
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                                                                                                                                                           #47.
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                                                                                    analgesia;
                                                                                                                                                                                                                                                                                                                                                                                                                            Gaps
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밁 Ś

Query Match

Local

Similarity

88.9%;

Pred. Score 14.8;

No.

1.8e+03;

0

DB 1; Length 18;

1.5%;

'n

Bieller A,

Schaefer MKH;

09-DEC-2002; 2002DE-01057421 01-DEC-2003; 2003WO-EP013522

GRUENENTHAL GMBH.

24-JUN-2004.

(vănilloid receptor type 1) receptor, or a functional derivative, allo or fragment of this region, or a sequence that hybridises to it under standard conditions. The VR1 modulator is derived from one or more of positions 221931-223344 of GenBank AL670399, 31673-36359 of AL663116,

AL663116, or

describes a novel nucleic acid containing a specific at least one region that modulates expression of the

of the

紐

This invention

segment having

Disclosure; Page 52; 68pp; German.

New nucleic acid that modulates expression of the vanilloid receptor-1, useful for control of pain or sensitivity disorders, comprises sequence from control regions of the receptor gene.

sequences

44731-43231

or 36616-33151 of AF168787 and is involved in transmission of

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; drug polymorphic genetic proficilinical tria
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           pain, particularly in primary sensory neurons. The invention also describes a vector that contains the VR1 modulator, host cells containing this vector (other than human germ or embryonal stem cells) and a method for modulating expression of the VR1 receptor by introducing the modulator or the vector into a cell that contains the VR1 gene. The products of the invention are used for detecting a transcription factor from its binding to a regulatory sequence (or a double-stranded oligonucleotide fragment of it), e.g. by Western blotting or enzymelinked immunosorbant assay, particularly for diagnosis of diseases associated with overexpression or underexpression of the transcription factor. The region that modulates VR1 receptor expression includes a binding site for a transcription factor, e.g. MZF1, NFkappaB, NFAT or GATAI. The nucleic acids of the invention, or vectors containing them,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            are used for prevention or treatment of pain, also for treating sensitivity disorders, e.g. analgesia, hypalgesia or hyperalgesia, also neuralgia and myalgia, that are associated with activity of the VR1 receptor. This sequence represents a fragment of human VR1 exon 1d DNA which is capable of binding to a transcription factor.
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Identifying individuals having a polymorphism, useful for determining the effectiveness or side effect of a drug or treatment protocol, comprises detecting at least one polymorphism in the drug metabolizing enzyme nucleic acid.
                                                                                                                                                                                                                                                                                                                                                                                           27-DEC-2000; 2000JP-00399443.
02-MAY-2001; 2001JP-00135256.
27-AUG-2001; 2001JP-00256862.
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bhic site; drug evaluation; drug screening; genotyping;
profiling; therapeutic customisation; adverse reaction;
l trial; drug approval; single nucleotide polymorphism; SNP; ds
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                                                                                                                                                                                                                                                     Sekine A,
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/*tag= a
/standard_name= "Single nucleotide polymorphism (SNP)"
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Pred. No. 1.
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CC evaluating and screening drugs using genetic polymorphism data. Genetic CC polymorphism data, particularly that relating to single nucleotide CC polymorphisms (SNPs), may be used in studying the relationship between CC DNA sequence variations and human diseases, conditions, and responses to CC drugs. SNPs are also useful as polymorphism markers for discovering genes that cause or exacerbate certain diseases. SNPs are particularly useful in the above respects as they are stable in populations, occur frequently, and have lower mutation rates than other genome variations of in genes encoding drug merabolising enzymes allows the customisation of CC drug therapies based upon the genetic profile of individual patients. CC This would not only take the guesswork out of selecting the drug with the CC greatest therapeutic effect for a particular patient, but would also reduce the likelihood of adverse reactions, thereby increasing safety. CC enholes of the invention are also useful in the drug discovery and CC approval processes. For example, individuals could be selected for capable of responding to a particular drug or drug class, and previously failed drug candidates could be revived if they were matched with more capable of responding to a particular drug or drug class, and previously failed drug trials, the time taken for a drug to be approved, the length of time patients are on medication and the number of different medications a patient needs to take before finding an effective therapy or medications a patient needs to take before finding an effective therapy
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Sequence 41 BP;
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8 A; 12 C; 13 G; 8 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    represent polymorphic sites within genes
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RESULT 2129
ABZ46915/c
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Best Local 9
                                                               Key
variation
                                                                                                                                             Human; drug metabolising enzyme; gene; drug metabolism; polymorphic site; drug evaluation; drug screening; geno
                                                                                                  Homo
                                                                                                                        clinical trial;
                                                                                                                                   polymorphic genetic pro
                                                                                                                                                                                 Human ATP-binding
                                                                                                                                                                                                        26-JUN-2003
                                                                                                                                                                                                                              ABZ46915
                                                                                                                                                                                                                                                     ABZ46915 standard; DNA; 41
                                                                                                  sapiens
                                                                                                                                                                                                                                                                                                                                 619 TGAGACAGAGTCTCAACTCTGTCACCCAGGCTGG
                                                                                                                                                                                                                                                                                                               35
                                                                                                                       phic site; drug evaluation; drug screening; genotyping;
profiling; therapeutic customisation; adverse reaction,
l trial; drug approval; single nucleotide polymorphism;
                                                                                                                                                                                                                                                                                                                                                                      Similarity
                                                                                                                                                                                                                                                                                                               TGAGCCAAGATCTCGCCACTGCAGTCCAGCCTGG
                                                                                                                                                                                                        (first entry)
                                                      Location/Qualifiers replace(17,A) /*tag= a
                               /standard_name= "Single nucleotide
replace(21,T)
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/standard_name= "Single nucleotide polymorphism (SNP)"
                                                                                                                                                                                 cassette ABCA7 gene polymorphic site,
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0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                       .2e+03;
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                                                                                                                                                                                                                                                                                                                                                            12;
                                                                                                                                      adverse reaction;
                                                                                                                                                                                                                                                                                                                                                                                  Length 41;
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                                             polymorphism (SNP)"
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                                                                                                                                                              chromosome
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AXU
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Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   evaluating and screening drugs using genetic polymorphism data. Genetic polymorphism data, particularly that relating to single nucleotide polymorphisms (SNPs), may be used in studying the relationship between polymorphisms (SNPs), and buman diseases, conditions, and responses to DNA sequence variations and human diseases, conditions, and responses to drugs. SNPs are also useful as polymorphism markers for discovering genes that cause or exacerbate certain diseases. SNPs are particularly useful that cause or exacerbate certain diseases.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequences ABZ43217-ABZ50887 represent polymorphic sites within genes encoding enzymes associated with drug metabolism. The invention relates to methods and compositions for identifying individuals who have at least one polymorphism in such drug metabolising enzyme-encoding genes. The polymorphism may be identified in a nucleic acid sample using probes or primers specific for a sequence selected from ABZ43217-ABZ50887 using a variety of detection assays, including hybridisation assays, nucleic acid arrays and PCR-based methods. The invention also encompasses methods of
ABZ45508;
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02-MAY-2001; 2001JP-00135256
27-AUG-2001; 2001JP-00256862
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                                           ABZ45508 standard; DNA; 41 BP
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22; Conserv
                                                                                                                                                            TGAGCCAAGATCTCGCCACTGCAGTCCAGCCTGG
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ilarity 64.7%;
Conservative
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                                                                                                                                                                                                                                                      Score 14.8; DB 1;
Pred. No. 2.2e+03;
0; Mismatches 12
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                                                                                                                                                                                                                                                      Gaps
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CC in the above respects as they are stable in populations, occurred frequently, and have lower mutation rates than other genome variations of such as repeating sequences. The detection and analysis of polymorphisms of in genes encoding drug metabolising enzymes allows the customisation of control of the customisation of the greatest therapies based upon the genetic profile of individual patients. This would not only take the guesswork out of selecting the drug with the greatest therapeutic effect for a particular patient, but would also reduce the likelihood of adverse reactions, thereby increasing safety. CC Methods of the invention are also useful in the drug discovery and capable of the invention are also useful in the drug discovery and comportant patient populations. The methods data and previously failed drug candidates could be revived if they were matched with more capable of responding to a particular drug or drug class, and previously failed drug candidates could be revived if they were matched with more caparopriate patient populations. The methods, data and compositions of the invention may therefore lead to a an increase in the range of compositions failed drug trials, the time taken for a drug to be approved, the length of time patients are on medication and the number of different medications a patient needs to take before finding an effective therapy
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      evaluating and screening drugs using genetic polymorphism data. Genetic polymorphism data, particularly that relating to single nucleotide polymorphisms (SNPs), may be used in studying the relationship between polymorphisms (SNPs), may be used in studying the relationship between DNA sequence variations and human diseases, conditions, and responses to drugs. SNPs are also useful as polymorphism markers for discovering genes that cause or exacerbate certain diseases. SNPs are particularly useful
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02-MAY-2001; 2001JP-00135256
27-AUG-2001; 2001JP-00256862
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ABZ46914/c
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Best Local S
Matches 22
Sequences ABZ43217-ABZ50887 represent polymorphic sites within genes encoding enzymes associated with drug metabolism. The invention relates to methods and compositions for identifying individuals who have at least one polymorphism in such drug metabolising enzyme-encoding genes. The polymorphisms may be identified in a nucleic acid sample using probes or primers specific for a sequence selected from ABZ43217-ABZ50887 using a variety of detection assays, including hybridisation assays mucleic acid arrays and PCR-based methods. The invention also encompasses methods of evaluating and screening drugs using genetic polymorphism data, particularly that relating to single nucleotide polymorphisms (SNPs), may be used in studying the relationship between DNA sequence variations and human diseases, conditions, and responses to drugs. SNPs are also useful as polymorphism markers for discovering genes
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                                                                                                                                                                                                                                                        Identifying individuals having a polymorphism, useful for determining the effectiveness or side effect of a drug or treatment protocol, comprises detecting at least one polymorphism in the drug metabolizing enzyme
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02-MAY-2001; 2001JP-00135256.
27-AUG-2001; 2001JP-00256862.
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clinical trial; drug approval; single nucleotide polymorphism;
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polymorphic
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                                                                                                                                                                                                                                                                                                                                               Nakamura Y,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   27-DEC-2001; 2001WO-JP011592
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                                                                                                                                                                                                                 Claim 23; Page 129;
                                                                                                                                                                                                                                                                                                                                                                               (RIKE )
                                                                                                                                                                                                                                                                                                                     2002-583571/62.
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                                                                                                                                                                                                                                                                                                                                                                               RIKEN KK
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   metabolising enzyme; gene; drug metabolism;
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replace(25,T)
/*tag= b
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Pred. No. 2.2e+03;
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RESULT 2132
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  consider the repeating sequences. The detection and analysis of polymorphisms of greatest passed upon the genetic profile of individual patients. CC this would not only take the guesswork out of selecting the drug with the CC greatest therapeutic effect for a particular patient, but would also creduce the likelihood of adverse reactions, thereby increasing safety. CC Methods of the invention are also useful in the drug discovery and capproval processes. For example, individuals could be selected for CC clinical trials only if their genetic profiles indicate that they are CC capable of responding to a particular drug orders, and previously cfailed drug candidates could be revived if they were matched with more CC appropriate patient populations. The methods, data and compositions of the invention may therefore lead to a an increase in the range of CC possible drug targets and decreases in the number of adverse drug consistency from the methods.
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       that cause or exacerbate certain diseases. SNPs are particularly useful in the above respects as they are stable in populations, occur frequently, and have lower mutation rates than other genome variations such as repeating sequences. The detection and analysis of polymorphism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    reactions, failed drug trials, the time taken for a drug to be approved, the length of time patients are on medication and the number of different medications a patient needs to take before finding an effective therapy
                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; cholinergic receptor, nicotinic, beta polypeptide 3; CHRNB3; single nucleotide polymorphism; SNP; drug screening; Alzheimer's disease; neurological disorder; gene therapy; genotyping; haplotyping; primer; allele-specific oligonucleotide; ASO; ss.
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                                                                                                                                              Chew
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                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human CHRNB3 gene polymorphism detecting ASO primer #11.
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                                                                                                                                                                                                                           (CHEW/)
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                                                                                                                                                                                              CHEW A.
CHOI J Y
KOSHY B.
                                                                                                                                                                                                          GENAISSANCE PHARM INC
CHEW A.
CHOI J Y.
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                                                                                                                                             Choi JY,
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0; Mismatches
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                                                                                                                                              Stephens JC;
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New polynucleotide, useful for studying expression and function CHRNB3, comprises polymorphic variant of cholinergic receptor, repeta polypeptide 3 (CHRNB3) gene, containing one of polymorphic

nicotinic, c sites PS1

2001-626425/72

Claim 15;

Page 15; 68pp; English

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RESULT 2133
AAD20695
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Best Local Sim
Matches 14;
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                             The invention relates to methods for haplotyping glycoprotein Ib (platelet) alpha polypeptide (GPIBA) gene of an individual. The method involves determining if the individual has one of the GPIBA haplotypes haplotype pairs. The methods of the invention are useful for disease diagnosis and in the discovery and development of drugs for treating diseases associated with GPIBA activity e.g. Bernard-Soulier syndrome, platelet-type von Wilebrand disease, HIV and Alzheimer's disease. The present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is allele-specific oligonucleotide (ASO) primer used for the present sequence is all the present sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New haplotypes of the glycoprotein Ib platelet alpha polypeptide gene useful for diagnosis and drug discovery for treating Bernard Soulier syndrome, platelet-type von Willebrand disease, HIV and Alzheimer's
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human GP1BA gene polymorphisms
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RESULT 2135

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                                                                                                                                      The present invention describes an isolated polynucleotide (I) comprising a sequence which is a polymorphic variant (PV) of a reference sequence for aldo-keto reductase family 1, member B1 (AKR1B1) gene or its fragment, having the 22214 base pair sequence given in ABL01105. AKR1B1 has antidiabetic activity and can be used in gene therapy. AKR1B1 can be used in the treatment of diabetes. The human AKR1B1 gene is located on chromosome 7935. ABL01107 to ABL01129 represent allele-specific oligonucleotide (ASO) probes used in the detection of polymorphisms in the human AKR1B1 gene; ABL01130 to ABL0117 represent ASO primers used in the detection of polymorphisms in the human AKR1B1 gene; and ABL01176 to ABL01221 represent preferred primers used in the detection of polymorphisms in the human AKR1B1 gene; and ABL01176 to ABL01221 represent preferred primers used in the detection of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; aldo-keto reductase family 1 member B1; aldose reductase; ss; AKR1B1; chromosome 7q35; detection; polymorphism; ASO; probe; primer; allele-specific oligonucleotide; antidiabetic; gene therapy; diabetes.
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                                                                                                               Sequence 15
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                                                                                                                                                                                                                                                                                                                                                           gene useful in studying expression and function of the protein, useful for screening drugs to treat diseases e.g. diabetes.
                                                                                                                                                                                                                                                                                                                                                                                           Novel polymorphic variants of aldo-keto reductase family 1, member bl
                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2002-075056/10
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABL01146;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2002-075056/10
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  polymorphisms in the human AKR1B1 gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Claim 16; Page 14; 103pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                for screening
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                                                                                                                                                                                                 26-MAR-2002
                                                                                                                                                                                                                                                                                                                AAD26858
Homo sapiens
                                                                                Human; G-protein coupled receptor 4; GPR4; haplotyping; polymorphism;
                                                                                                                                      Human GPR4 gene polymorphism detecting ASO primer #17.
                                                        allele-specific
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                                                        oligonucleotide; ASO;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   polymorphism
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therapy; diabetes.
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     Claim 16; Page 13; 95pp; English
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RESULT 2137
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Best Local &
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The invention relates to G-protein coupled receptor 4 (GPR4) gene variants. The data about the GPR4 polymucleotides and polypeptides and the polymorphisms associated with them are useful for haplotyping at the GPR4 locus. Allele-specific oligonucleotide (ASO) is useful as probes and primers for assaying a polymorphism in GPR4 gene. The present sequence is an ASO primer used to detect human GPR4 gene polymorphism
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Haplotyping, (H1), the individual, comprising
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New 6-phosphofruoto-2-kinase/fructose-2,6-bisphosphatase 2 (PFKFB2) gene variants, for improving efficiency and reliability in the development of drugs for treating diseases associated with PFKFB2 activity e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; 6-phosphofructo-2-kinase/fructose-2,6-biphosphatase 2; PFKF cytostatic; antidiabetic; gene therapy; cancer; diabetes; ss; ASO;
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                                                                                                                                                                                                                                                                       07-JUN-2001; 2001WO-US018458
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                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
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                                                                                             2002-566434/60.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                   atic; antidiabetic; gene therapy; cancer; diabe
specific oligonucleotide; probe; polymorphism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                 GENAISSANCE
                                                                                                                                    Kazemi A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           SC,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 4 A; 2 C; 6 G; 2 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (H1), the G-protein coupled receptor 4 (GPR4) gene of comprising determining which haplotype an individual.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first
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93.3%;
                                                                                                                                    Koshy B;
                                                                                                                                                                                   PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ΑE,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Kazemi
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 14.6; DB 1;
Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Koshy
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           PFKFB2;
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RESULT 2138
ABL51983/c
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Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to a novel human 6-phosphofructo-2-kinase/ fructose -2,6-biphosphatase 2 (PFKFB2) isogene. The PFKFB2 of the invention has cytostatic and antidiabetic activity. The polynucleotides may have a use in gene therapy. The identified candidate agents targeting PFKFB2, are useful for treating cancer and diabetes. The methods of the invention are useful for improving the efficiency and reliability of several steps in the discovery and development of drugs for treating diseases associated with PFKFB2 activity. The present sequence represents a allele specific oligonucleotide (ASO) probe used in the invention to detect PFKFB2 gene
         The present invention describes an isolated polynucleotide (I) having a sequence (S1) comprising soluble carrier family 18 (vesicular monoamine), member 2 (SLC18A2) isogene selected from 49 isogenes with regions of a sequence (SS) of 40023 bp (see ABL51954), and defined by a corresponding set of polymorphisms whose locations and identities are given in the specification; or a sequence (S2) complementary to (S1). (I) has
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 15 BP; 2 A; 1 C; 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            misc_feature
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      vesicular monoamine transporter; VMAT2; polymorphic site; SNP;
single nucleotide polymorphism; antiinflammatory; neuroleptic;
haplotyping; genotyping; respiratory inflammatory disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    11-JUL-2002
                                                                                                                            Claim
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                                                                                                                                                                                                                                                                                   (GENA-) GENAISSANCE PHARM INC.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         neuropsychiatric
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                                                                                                                                                        neuropsychiatric
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                                                                                                                                                                                       genetic variants of soluble carrier family 18 (vesicular
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SLC18A2 allele
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      solute carrier family 18 member 2; SLC18A2; vesicular monoamine;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
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                                                                                                                                                                                                                                                     AΕ
                                                                                                                         Page 14; 183pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                           /note= "polymorphic site indicated by an ambiguity base"
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       disorder; monoaminergic brain
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         93.3%;
                                                                                                                                                                       gene useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     specific
                                                                                                                                                        disorders involving
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 14.6;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     oligonucleotide primer SEQ ID NO:31
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                                                                                                                                                                        for screening
                                                                                                                                                                                                                                                    Sausker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.6e+03;
                                                                                                                                                      ening drugs to treat diseases monoaminergic brain systems.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       system; primer;
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Matches 14
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                           The invention relates to an isolated polypeptide comprising a sequence which is a polymorphic variant of a reference sequence for the amyloid beta precursor protein binding protein 1, 59kD (APPBPI) protein or its fragment. The polymorphic variants are useful in studying the expression and function of APPBPI, in expressing APPBPI protein for use in screening for candidate drugs to treat diseases related to APPBPI activity, in studying the effect of the variation on the biological activity, in APPBPI, and the binding affinity of candidate drugs targeting APPBPI for the treatment of disorders such as Alzheimer's disease. The haplotyping methods are useful in validating APPBPI as a candidate target for treating a specific condition or disease predicted to be associated with
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human; amyloid beta precursor protein binding protein 1; APPBP1; probe; Alzheimer's disease; transgenic animal; platelet aggregation; single nucleotide polymorphism; SNP; allele-specific oligonucleotide; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         polymorphic variants, useful e.g. of APPBP1 and screening candidate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Amyloid beta precursor protein binding protein 159 kD (APPBP1) gene polymorphic variants, useful e.g. in studying the expression and function of APPBP1 and screening candidate drugs for treating Alzheimer's disease.
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   treating a specific APPBP1 activity, or
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Stephens CJ;
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                                                                                                                                                                                                                                                                                                                                                                                                                                   English.
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  function
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RESULT 2140
ABK81778
ID ABK8177
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XX I1
The present invention relates to a new cholinergic receptor, muscarinic 5 (CHRM5) polynucleotide comprising a sequence which is a polymorphic variant for a reference sequence for the CHRM5 gene or its fragment, or a polymorphic variant of a reference sequence for a CHRM5 cDNA or its polymorphic variant of a reference sequence for a CHRM5 cDNA or its cfragment. The invention is useful in drug screening assays. The molecules of the invention are useful in studying the expression and function of chrys, and in expressing CHRM5 protein for use in screening for candidate drugs to treat diseases related to CHRM5 activity. The methods of the cinvention are useful in developing diagnostic tests and therapeutic contract drugs for treating specific condition or disease associated complete drugs for treating specific condition or disease associated complete drugs for treating specific condition or disease associated complete drugs for treating specific condition or disease associated complete the haplotypes or one of the haplotype pairs. The invention is useful in determining whether an individual conceptual in a variety of diagnostic and prognostic formats and therapeutic methods. The invention is also useful in genotyping and/or haplotyping condition of the haplotyping individual. The present nucleic acid sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human CHRM5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        13-AUG-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ABK81778 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Bieglecki KM,
Sausker EA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ASO; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Novel cholinergic receptor,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2002-435523/46
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     11-OCT-2001; 2001WO-US032022
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 14; Page 13; 72pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    related to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       19-OCT-2000; 2000WO-US029071.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (GENA-) GENAISSANCE PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   cholinergic receptor muscarinic 5; CHRM5; genotyping; haplotyping; nucleotide polymorphism; SNP; allele-specific oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 the receptor activity.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   gene polymorphism detection ASO primer
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Chew A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       and in screening
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            2 C; 7 G; 3 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               93.3%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ВP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   arinic 5 polynucleotide useful for candidate drug to treat d
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Denton RR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  No. 1.6e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0
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RESULT 2141
ABK81766/c
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                                      CC (CHRM5) polynucleotide comprising a sequence which is a polymorphic comprising a sequence which is a polymorphic comprising a sequence which is a polymorphic comprising a sequence for the CHRM5 gene or its fragment, or a CC polymorphic variant of a reference sequence for the CHRM5 cDNA or its comprision of a reference sequence for a CHRM5 cDNA or its complex confidence. The invention is useful in drug screening assays. The molecules CC cHRM5, and in expressing CHRM5 protein for use in screening for candidate comprise to treat diseases related to CHRM5 activity. The methods of the cinvention are useful in developing diagnostic tests and therapeutic conditate drugs for treating specific condition or disease associated comprise the chaptorype so one of the haplotypes or one of the haplotypes or one of the haplotype so one of the haplotypes or one of the haplotype pairs. The invention is useful in genotyping and/or haplotyping condition of allele-specific oligonucleotide (ASO) crobes (ABK81765-ABK81774) that were used in the invention to detect
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    represents one of a collection of allele-specific primers (ABK81775-ABK81794) that were used in the polymorphisms in the human CHRM5 gene
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human, cholinergic receptor muscarinic 5; CHRM5; genotyping; haplotyping, single nucleotide polymorphism; SNP; allele-specific oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ABK81766;
                                                                                                                                                                                                                                                                                                                                                   Novel cholinergic receptor, muscarinic 5 therapeutically and in screening for canc related to the receptor activity.
                                                                                                                                                                                                                                                                                                                                                                                                                                                      Bieglecki KM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                19-OCT-2000; 2000WO-US029071
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human CHRM5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       13-AUG-2002
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                             polymorphisms in
                                                                                                                                                                                                                                                                                                                       Claim 14; Page 13; 72pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (GENA-) GENAISSANCE PHARM INC.
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                                                                                                                                                                                                                                                                                                                                                                                                                                        EA,
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                                                                                                                                                                                                                                                                                                                       English.
                                CHRM5
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                  nrinic 5 polynucleotide useful for candidate drug to treat of
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Denton
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                                                                  RESULT 2142
ABK81777/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         밁
                                                                                                         The present invention relates to a new cholinergic receptor, muscarinic 5 (CHRM5) polynucleotide comprising a sequence which is a polymorphic variant for a reference sequence for the CHRM5 gene or its fragment, or a polymorphic variant of a reference sequence for a CHRM5 cDNA or its fragment. The invention is useful in drug screening assays. The molecules of the invention are useful in studying the expression and function of CHRM5, and in expressing CHRM5 protein for use in screening for candidate drugs to treat diseases related to CHRM5 activity. The methods of the invention are useful in developing diagnostic tests and therapeutic treatments. The method is also useful in the design of clinical trials of candidate drugs for treating specific condition or disease associated with CHRM5 activity and is useful in the design of clinical trials of the one of the haplotypes or one of the haplotypes or one of the haplotypes and therapeutic methods. The invention is also useful in genotyping and/or haplotyping the CHRM5 gene in an individual. The present mucleic acid sequence represents one of a collection of allele-specific oligonucleotide (ASO) primers (ABK81775-ABK81794) that were used in the invention to detect
Query Match
Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Novel cholinergic receptor, muscarinic 5 polynucleotide useful therapeutically and in screening for candidate drug to treat diseases related to the receptor activity.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2002-435523/46
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; cholinergic receptor muscarinic 5; CHRM5; genotyping; haplotyping;
single nucleotide polymorphism; SNP; allele-specific oligonucleotide;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          13-AUG-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ABK81777 standard; DNA; 15
                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 14; Page 13; 72pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sausker EA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Bieglecki KM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            11-OCT-2001; 2001WO-US032022.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO200232924-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human CHRM5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABK81777
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            19-OCT-2000; 2000WO-US029071.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (GENA-) GENAISSANCE PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     383
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         15
                Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        gene polymorphism detection ASO primer #3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Stephens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
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                                                                                              the human CHRM5 gene
                                                              P
               93.3%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                5 C; 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              JC;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Choi JY,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP.
                                                              G; 4 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.6; DB 1;
Pred. No. 1.6e+03;
               Score 14.6; DB 1; Length 15; Pred. No. 1.6e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Nandabalan
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Gaps
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BXBXBXSXBXBXB
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                                                                                                                                                                                                                                                                                                         RESULT 2143
XXXXXXXX
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                                                                                                                                      RESULT 2144
ABA93847
                                                                                                                                                                                                                                            Query Match
Best Local Similarity
Matches 17; Conserv
                                                                                                                                                                                                                                                                                                                                              The Alu primers PDJ34 and 2484 (AAQ45257 and AAQ45258) were used to amplify DNA from yeast artificial chromosomes as part of a cloning procedure to isolate probes for specific chromosomal abnormalities. particular, probes to diagnose Prader-Willi/Angelman Syndrome were identified. The majority of PWS/Angelman patients are deleted for a common set of markers including ML34, IR4-3R, TD189-1 and TD3-21.
                                                                                                                                                                                                                                                                                                         Sequence 35 BP; 5 A; 9 C; 8 G; 5 T; 0 U; 8 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Diagnosis of genetic disorders associated with chromosomal abnormalities and uniparental disomy, e.g. Prader-Willi;Angelman syndrome - using in situ hybridisation using probes spanning the IR4-3R or GABRB3 regions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          31-MAR-1994.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WO9406936-A1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Yeast Artificial Chromosome; YAC; polymerase chain reaction; PC sequence tagged site; genetic disorder; diagnosis; abnormality; Prader-Willi; Angelman; Beckwith-Wiedermann; syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Alu primer PDJ34 to amplify Yeast Artificial Chromosome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        25-MAR-2003
28-OCT-1994
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAQ45257
                                                                                                                                                                                                                                                                                                                                                                                                                                                Example 5; Page 32; 91pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 1994-118484/14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Airhart SD,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   11-SEP-1992;
                                                                                                                         ABA93847 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (BAYU ) BAYLOR COLLEGE MEDICINE
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              10-SEP-1993;
                                                                                                                                                                                                                                                                                                                                  (Updated on 25-MAR-2003 to correct PN field.)
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                                                                                                                                                                                                                     GTGCTGGGATTACAGGCGTGCAGCCGTGCCTGG 424
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            standard; DNA; 35
                                                                                                                                                                                              GAGCYRWGATYRYRCCAYTGCACTCCAGCCTGG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ARAGTGCTGGGATTA 1
                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mutirangura A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (revised)
(first entry)
                                                                   (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   92US-00943639.
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                                                                                                                         DNA;
                                                                                                                                                                                                                                                               1.5%;
                                                                                                                                                                                                                                                  6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Ledbetter DH;
                                                                                                                                                                                                                                                  Score 14.6; DB l;
Pred. No. 2.3e+03;
6; Mismatches 10
                                                                                                                                                                                              34
                                                                                                                                                                                                                                                     10;
                                                                                                                                                                                                                                                                             Length
                                                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                                                                                35,
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Human; GASC1; chromosome 9;

gene amplified in squamous cell carcinoma 1; cancer; chromosome 9p23-24; cell differentiation; gene thera

gene therapy;

Human GASC1 PCR primer SEQ ID NO:5.

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                                                                                                                                                                                                                                                                  RESULT 2145
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   cell proliferation;
                                                                                                                                                                                                                                                                                                                                                                           Sequence 35
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Example 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 cell proliferation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           product
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Gene GASC1 amplified in squamous cell carcinoma and its expression
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2002-090209/12.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Inazawa J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12-JUN-2000; 2000JP-00174946
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     12-JUN-2001; 2001WO-JP004959
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
                                                                                                                           Synthetic
                                                                                                                                                      single nucleotide
                                                                                                                                                                                   Human chromosome 19 single nucleotide polymorphism detecting probe #22
                                                                                                                                                                                                        06-MAY-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (SAKA ) OTSUKA PHARM CO LTD
                                                                                               variation
                                                                                                                                                      sequence polymorphism analysis; human; chromosome 19q; cancer; RAI; ss;
single nucleotide polymorphism; SNP; probe.
                                                                                                                                                                                                                                               ADK41334 standard;
27-JUN-2002;
                   27-JUN-2003;
                                      08-JAN-2004
                                                         WO2004003229-A2
                                                                                                                                     sapiens
                                                                                                                                                                                                                                                                                                                 392 GIGCIGGATIACAGGCGIGCAGCCGIGCCIGG 424
                                                                                                                                                                                                                                                                                                                                     1 Similarity
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                                                                                                                                                                                                                                                                                                                                                                                              invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          for diagnosis investigation and treatment of disorders involving
                                                                                                                                                                                                                                                                                               GAGCYRWGATYRYRCCAYTGCACTCCAGCCTGG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Page 77; 82pp; Japanese.
                                                                                                                                                                                                                                                                                                                                                                            BP; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Imoto I;
                                                                                                                                                                                                                                                                                                                                      Conservative
2002DK-00001005..
                   2003WO-DK000448
                                                                                                                                                                                                        (first
                                                                                   Location/Qualifiers replace(20,G)
/*tag= a
                                                                          standard_name= "Single nucleotide polymorphism"
                                                                                                                                                                                                                                                                                                                                                                            Þ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  such as cancer.
                                                                                                                                                                                                                                                DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   PCR primer;
                                                                                                                                                                                                        entry)
                                                                                                                                                                                                                                                                                                                                                                           9 C; 8 G; 5 T; 0 U; 8 Other;
                                                                                                                                                                                                                                                                                                                                             51.5%;
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                                                                                                                                                                                                                                                                                                                                      6.
                                                                                                                                                                                                                                                                                                                                     Score 14.6; Di
Pred. No. 2.3e
6; Mismatches
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                                                                                                                                                                                                                                                                                                                                                2.3e+03
                                                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                 34
                                                                                                                                                                                                                                                                                                                                     10;
                                                                                                                                                                                                                                                                                                                                                        Length 35;
                                                                                                                                                                                                                                                                                                                                       Indels
                                                                                                                                                                                                                                                                                                                                       0,
                                                                                                                                                                                                                                                                                                                                                                                                                   represents
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RESULT 2146
ABZ43589
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Best Local 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 estimating a treatment response of an individual suffering from cancer to a disease treatment; an antibody directed to an epitope of a RAI gene product; and a kit for use in the method of estimating the disease risk or prognosis of an individual or for estimating a treatment response of an individual suffering from cancer to a disease treatment, comprising at least one primer or probe and optionally amplifying means for nucleic acid amplification. The novel method is useful for estimating the disease risk or prognosis of an individual or for estimating a treatment response of an individual suffering from cancer to a disease treatment. This polynucleotide sequence represents a probe used for detecting single nucleotide polymorphisms in the DNA of human chromosome 19 of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel method of estimating disease risk or prognosis of an individual by sequence polymorphism analysis, especially polymorphisms in the human chromosome 19q. The invention further relates to: estimating a treatment response of an individual suffering from cancer to a disease treatment; a primer or probe for use in the method of estimating the disease risk or prognosis of an individual or for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        07-OCT-2002; 2002DK-00001500.
25-FEB-2003; 2003DK-00000289.
29-APR-2003; 2003DK-00000639.
                                                                                                                                                       Key
variation
                                                                                                                                                                                                                                                Human; drug metabolising enzyme; gene; drug metabolism; chromos polymorphic site; drug evaluation; drug screening; genotyping; genetic profiling; therapeutic customisation; adverse reaction; clinical trial; drug approval; single nucleotide polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Estimating the disease risk or prognosis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI;
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                                      04-JUL-2002.
                                                                                                                                                                                                                                                                                                                                                  Human cerebroside transferase CST gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 40
                                                                           WO200252044-A2
                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                           26-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                    ABZ43589;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ABZ43589 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (ARBE-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2004-142878/14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               388 CAAAGTGCTGGGATTACAGGCGTGCAGCCGTGCCTGG 424
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  18; SEQ ID NO 92; 145pp;
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ARBEJDSMILJO
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 8 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                              replace(21,A)
/*tag= a
/standard_name= "Single"
                                                                                                                                                                           Location/Qualifiers
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  13 C; 12 G; 7 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 14.6; DB 1;
Pred. No. 2.2e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Mismatches
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                                                                                                                                                                                                                                                                                                                                                      polymorphic site,
                                                                                                                    nucleotide polymorphism (SNP)"
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length
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27-DEC-2001; 2001WO-JP011592

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RESULT 2147
ABZ49741
ID ABZ4974
XX ABZ4974
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XX ABZ4974
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                                                                                                                                                                                                                                                                                                                                                                                                              CC variety of detection assays, including hybridisation assays, nucleic acid cc variety of detection assays, including hybridisation assays, nucleic acid cc evaluating and ecreening drugs using genetic polymorphism data. Genetic cc polymorphism data, particularly that relating to single nucleotide cc polymorphisms (SNPs), may be used in studying the relationship between cc DNA sequence variations and human diseases, conditions, and responses to that cause or exacerbate certain diseases, conditions, and responses to that cause or exacerbate certain diseases. SNPs are particularly useful cin the above respects as they are stable in populations, occur in genes encoding drug metabolising enzymes allows the customisation of crequently, and have lower mutation rates than other genome variations cc in genes encoding drug metabolising enzymes allows the customisation of creduce therapies based upon the genetic profile of individual patients. CC greatest therapeutic effect for a particular patient, but would also reduce the likelihood of adverse reactions, thereby increasing safety. CC enable of responding to a particular patient, but would also cc laparoval processes. For example, individuals could be selected for capable of responding to a particular drug or drug class, and previously failed drug candidates could be revived if they were matched with more capacitions, failed drug trials, the time taken for a drug to be approved, the length of time patients are on medication and the number of different medications a patient needs to take before finding an effective therapy
                                                                                                                                                                                                                                                                                                                                                                        Query Match
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02-MAY-2001; 2001JP-00135256
27-AUG-2001; 2001JP-00256862
                       Human cerebroside transferase CST gene polymorphic site, #6523
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             one polymorphism in such drug metabolising enzyme-encoding genes. The polymorphisms may be identified in a nucleic acid sample using probes or primers specific for a sequence selected from ABZ43217-ABZ50887 using a
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CC encoding enzymes associated with drug metabolism. The invention relates to methods and compositions for identifying individuals who have at least compositions for identifying individuals who have at least conjumorphism may be identified in a nucleic acid sample using genes. The copymorphism may be identified in a nucleic acid sample using probes or compared to a sequence selected from ABZ43217-ABZ50887 using a crariety of detection assays, including hybridisation assays, nucleic acid carrays and pcr-based methods. The invention also encompasses methods of carrays and pcr-based methods. The invention also encompasses methods of colymorphism data, particularly that relating to single nucleotide colymorphism data, particularly that relating to single nucleotide colorides. SNPs are also useful as polymorphism markers for discovering genes to that cause or exacerbate certain diseases, conditions, and responses to convags. SNPs are also useful as polymorphism markers for discovering genes to that cause or exacerbate certain diseases. SNPs are particularly useful crequently, and have lower mutation rates than other genome variations converting genes encoding drug metabolising enzymes allows the customisation of cargenese encoding drug metabolising enzymes allows the customisation of cargenese therapetes based upon the genetic profile of individual patients. Compared the invention are also useful in the drug discovery and capproval processes. For example, individuals could be selected for approval processes. For example, individuals could be selected for cappable of responding to a particular drug or drug class, and previously failed drug candidates could be revived if they were matched with more capputations, failed drug trials, the time taken for a drug to be approved, the length of time patients are on medication and the number of different medications a patient needs to take before finding an effective therapy
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02-MAY-2001; 2001JP-00135256
27-AUG-2001; 2001JP-00256862
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequences ABZ43217-ABZ50887 encoding enzymes associated
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Sequence 41 BP; 9 P 11 Ç 13 G; 8 T; 0 U; 0 Other

Query Match Best Local Similarity

1.5**%**; 69.0**%**;

Score 14.6; DB 1; Pred. No. 2.2e+03;

DB 1;

Length

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RESULT 2148
ADL64137
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                                        The invention relates to an isolated nucleic acid (1) derived from a human gene encoding a protein, such as the C1, S subcomponent protein (C1S), the alanyl aminopeptidase protein (ANPED), the meprin A, beta protein (MREP1B), the aminopeptidase P-like protein (XPN-PBP), the tissue kallikrein protein (KLK1), the membrane bound aminopeptidase P protein (XPN-PBP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (XPN-PBP2), The nucleic acid comprises at least one polymorphic position, including the alleles, reference alleles and alternate alleles of the single nucleotide polymorphisms, listed in the specification. The
                                                                                                                                                                                                                       New nucleic acid comprising a single nucleotide polymorphism at a specific location, useful in paternity testing, genetic analysis diagnosing, preventing or treating cardiovascular diseases e.g. angioedema or angina pectoris.
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polymorphic position resides in a (non)coding position within the genomic sequence of the gene. The polymorphic position residing in a coding position results in a missense or silent mutation of the translated
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CC product of the gene. The polymorphic position residing in a non-coding CC position resides within the untranslated region or an intronic region of the gene. Constructing haplotypes using the nucleic acids above further CC comprises using the haplotypes to identify an individual for the presence of a disease phenotype, and correlating the presence of the disease (CC phenotype with the haplotype. The disease phenotype is angioedema or an CC angioedema-like disorder. The nucleic acids, primers and probes are CC useful in phenotype correlations, paternity testing, medicine and genetic CC analysis. The nucleic acids and polypeptides can be used in diagnosing, CC preventing or treating cardiovascular diseases, e.g. angioedema, angina CC pectoris, hypertension, heart failure, myocardial infarction, aneurysm, CC arteriosclerosis, thrombosis, coronary artery disease or sepsis, inflammatory diseases, inflammatory arthritis, asthma, chronic cobstructive pulmonary diseases, inflammatory arthritis, asthma, chronic constructive pulmonary diseases, inflammatory arthritis, asthma, chronic constructive pulmonary diseases, cough reflex, allergies, or cancer. The present sequence represents a human single nucleotide polymorphism (SNP)
RESULT 2149
ADL64136
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(PERR/)
(POWE/)
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RAMANATHAN C
SWANSON B.
TSUCHIHASHI
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Edmonds M, Tsuchihashi

Hui L, Perr Z, Zerba K;

Perrone

Z,

Powell JR,

Ramanathan

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Swanson

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RESULT 2150
AAI76192
ID AAI7619
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          CC human gene encoding a protein, such as the C1, S subcomponent protein (CC (C18), the alanyl aminopeptidase protein (ANPEP), the meprin A, beta protein (MEP1B), the aminopeptidase P-like protein (XPN-PEP1), the tissue (CC protein (MEP1B), the aminopeptidase P-like protein (XPN-PEP1), the tissue (CC protein (MEP1B), the membrane bound aminopeptidase P protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1, alpha-2 subunit protein (CC (MIN-PEP2), or the soluble guanylate cyclase 1 least one polymorphic position. The coding (CC (MIN-PEP2), or the solution residing in a coding polymorphic position residing in a coding (CC (MIN-PEP2)) or the gene. The polymorphic position residing in a coding (CC (MIN-PEP2)) or the solution residing in a non-coding (CC (MIN-PEP2)) or the solution residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the polymorphic position residing in a non-coding (CC (MIN-PEP2)) or the protein of the translated (MIN-PEP2) or an introduced in disease or an alternative pulmorary disease, inflammatory arthritis, asthma, chronic (MIN-PEP2) or comparative pulmorary disease, inflammator
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New nucleic acid comprising a single nucleotide polymorphism at a specific location, useful in paternity testing, genetic analysis or diagnosing, preventing or treating cardiovascular diseases e.g. angioedema or angina pectoris.
                      30-NOV-2000; 2000WO-US032758.
                                                                                                                                                                                                    Human; single nucleotide polymorphism; SNP; genome; gene therapy; protein therapy; vaccine; probe; diagnostic assay; detection; quantitation; restorative therapy; polymorphic; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2004-180052/17.
                                                                                                                                                                                                                                                                                                    Human silent SNP containing nucleic acid SEQ:3133.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 41 BP; 9 A; 13 C; 11 G; 8 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 3; SEQ ID NO 59; 376pp; English.
                                                                    07-JUN-2001
                                                                                                                WO200140521-A2
                                                                                                                                                                                                                                                                                                                                                       09-NOV-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAI76192 standard; DNA; 51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to an isolated nucleic acid (I) derived from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  388 CAAAGTGCTGGGATTACAGGCGTGCAGCCGTGCCTGG 424
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              sequence represents a human single nucleotide polymorphism
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      CAGTGAGCTGAGATCGCACCACTGCACTCCAGCCTGG 41
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 14.6; DB 1;
Pred. No. 2.2e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             DB 1; Length 41;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                14;
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RESULT 2151
AAH89507/c
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Best Local Similarity
Matches 20; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sequences (I), which contain single nucleotide polymorphisms (SNPB).

AAM53121 to AAM53222 represent peptides related to human polymorphic polymucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used to down regulate expression and activity. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs).
                                                                                                                                                                                                                                                                       Human; single nucleotide polymorphism; SNP; paternity test; forensic test; aberrant protein expression; ds.
                                                                                                                                                                                                                                                                                                                            Human coding sequence polymorphic site SEQ ID NO: 288
                                                                                                                                                                                                                                                                                                                                                              01-OCT-2001
                                                                                                                                                                                                                                                                                                                                                                                                AAH89507;
                                                                                                                                                                                                                                                                                                                                                                                                                                 AAH89507 standard; DNA; 51 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 51 BP; 14 A; 16 C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          polypeptides in samples
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Polymorphic nucleic acid sequences, useful in genetic testing
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29-NOV-2000; 2000US-00726173.
                                                                                                07-JAN-2000; 2000US-0174962P
                                                                                                                                                                                                      WO200151670-A2
                                                                                                                                                                                                                                        Homo sapiens.
                                                                                                                                  05-JAN-2001; 2001WO-US000322
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                                                                  (CURA-) CURAGEN CORP.
                                                                                                                                                                    9-JUL-2001.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     260 AAGTGCTAGATACAGGACTGGCCACCATG 288
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         12 G; 9 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.6; D:
Pred. No. 2.1e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       2.1e+03;
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For

WPI; 2001-451871/48

Shimkets RA,

Leach MD

P-PSDB; AAM00390

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RESULT 2152
AAI76193
ID AAI7619
XX AAI7619
AC AAI7619
AC AAI7619
XX Human;
KW Human;
KW Protein
KW quantit
XX Homo sa
XX 
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Best L
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           polymorphisms, infection and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              09-NOV-2001
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AAI73060 to AAI79867 represent isolated human polymorphic polynucleotide sequences (I), which contain single nucleotide polymorphisms (SNPs). AAM53114 to AAM53329 represent peptides related to human polymorphic polynucleotide sequences. The sequences can be used in gene and protein therapy, and in vaccine production. (I) and the polypeptides encoded by them may be used in the prevention, diagnosis and treatment of diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; single nucleotide polymorphism; SNP; genome; protein therapy; vaccine; probe; diagnostic assay; quantitation; restorative therapy; polymorphic; ds.
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29-NOV-2000;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human silent
                                                                                                                                                                                                                                                                                                                                Polymorphic nucleic acid sequences, useful in
                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2001-356160/37.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               30-NOV-2000;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 human polynucleotides containing single nucleotide nisms, useful for the treatment and diagnosis of e.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               standard;
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                                                                                                                                                                                                                                    Page 1009; 2653pp;
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llarity 69.0%;
Conservative
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2000US-00726173.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                           Leach M;
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                                                                                                                                                                                                                                 English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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                                                                                                                                                                                                                                                                                                                                   genetic testing
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 detection;
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Best Loc
Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      associated with inappropriate expression of polymorphic polypeptides. For example, (I) may be used to treat disorders by rectifying mutations or deletions in a patient's genome that affect the activity of polypeptides by expressing inactive proteins or to supplement the patients own production of polypeptide. Additionally, (I) and its complementary sequences may also be used as DNA probes in diagnostic assays to detect and quantitate the presence of similar nucleic acids in samples, and therefore which patients may be in need of restorative therapy. The polypeptides encoded by (I) may be used as antigens in the production of antibodies specific for polymorphic polypeptides. The antibodies may also be used as diagnostic agents for detecting the presence of polymorphic polypeptides in samples
                         AAQ95282 and AAQ95283 are a primer pair for the PCR amplification of the simple tandem repeat (STR) corresponding to wg2g4. The STR can be used for treatment and diagnosis in human and veterinary medicine, partic. I genetic characterisation, mapping, linkage studies and analysis/diagnos of acquired disease alleles
Sequence 16
                                                                                                                                 Identifying simple tandem repeat loci in DNA - by screening DNA library to enrich for fragments contg. the repeats before cloning and rescreening, also simple tandem repeats for treatment or diagnosis.
                                                                                                                                                                                           WPI;
                                                                                                                                                                                                                                                                         21-DEC-1993;
                                                                                                                                                                                                                                                                                                    21-DEC-1994;
                                                                                                                                                                                                                                                                                                                                                          WO9517522-A2
                                                                                                                                                                                                                                                                                                                                                                                     Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                            characterisation; mapping; li
PCR primer WG2G4B; wg2g4; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                            Simple tandem repeat; STR; treatment; genetic; diagnosis;
characterisation; mapping; linkage studies; analysis; alleles;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Simple tandem repeat
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                09-FEB-1996
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAQ95283;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAQ95283
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence
                                                                                                            Claim
                                                                                                                                                                                                                      Jeffreys AJ,
                                                                                                                                                                                                                                                                                                                                 29-JUN-1995.
                                                                                                                                                                                                                                                 (UYLE-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Match
                                                                                                                                                                                           1995-240682/31.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    260
                                                                                                            25;
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                                                                                                                                                                                                                                                 VIND
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAGTGCTAGATACAGGACTGGCCACCATG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     51
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AGGAGTTCGAGACCAGCCTGGCCAGCATG
                                                                                                          Page 39; 51pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 13 A; 16 C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
  BP; 1
                                                                                                                                                                                                                                                 LEICESTER
                                                                                                                                                                                                                     Armour
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first
                                                                                                                                                                                                                                                                                                       94WO-GB002789
                                                                                                                                                                                                                                                                            93GB-00026052
  A; 7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                entry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.5%;
                                                                                                                                                                                                                      4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (STR)
  C; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     PCR primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    13 G; 9 T; 0
  G; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score 14.6;
Pred. No. 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Pred.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
  T; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WG2G4B
  Ç
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          30
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             .1e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     U; 0 Other;
     0 Other
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                            dicine, partic. for analysis/diagnosis
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                                                                                  the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0
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Query Match Best Local S Matches 15

l Similarity

Conservative

0

Mismatches

1.5%;

Score 14.4; DB 1; Pred. No. 1.7e+03;

Length 16;

Indels

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Gaps

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AAD12238/c
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                                                                   Query Match
Best Local S
Matches 15
                                                                                                                                                                    gene comprises the template. Gene structure can be determined without the need to sequence the entire gene. The method provides information necessary to determine gene structure and phenotypic expression without the need to sequence entire chromosomal copy of the gene or fragment. The methods are useful in germline sequence variation analysis. The method is also useful for determining the boundaries between regions of nucleic acids that were separated by intervening sequence, and also for determining boundaries present in genes containing group I type introns such as Tetrahymena rRNA, where self-splicing occurs in the presence of guanosine cofactor. The present sequence is a primer used for sequencing human CYP450 2C19 cDNA related to the invention
                                                                                                                                                                                                                                                                                                                                                                    The present invention relates to a method for determining gene structure when the genomic sequence is unknown. The method involves sequencing the gene across exon-intron boundaries using evenly spaced primers or tiled primers comprises nucleic acids that hybridise to the known cDNA sequence of the gene at about 100-300 base intervals and the comprises for the comprise of the gene at about 100-300 base intervals and the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Human; gene structure; phenotypic expression; guanosine cofactor; germline variation analysis; exon-intron boundary; Tetrahymena rRNA; cytochrome P450 2C19; CYP450 2C19; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Determining structure of genes whose sequence is not known from cDNA, sequencing the gene or gene across exon-intron boundaries using evenly spaced primers comprising nucleic acids that hybridize to the cDNA of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human CYP450 2C19 cDNA upper strand sequencing primer 1064U
                                                                                                                                          Sequence 16 BP; 5 A; 4 C; 5 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAD12238 standard; DNA; 16 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Example
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2001-465380/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    20-JAN-2000; 2000US-00488127
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17-JAN-2001; 2001WO-US001461
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WO200153529-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-SEP-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (GENO-) GENOME THERAPEUTICS CORP
                                 822
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          837 GATCTGCCTGCCTCGG
16
                                                                 l Similarity
15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2;
                             ATCTCTGGACCTTGTG 837
ATCTCTGGACCTCGTG 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Page 27; 81pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Fitzgerald MS;
                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                                  1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             852
                                                                   0;
                                                                                    Score 14.4; DB 1;
Pred. No. 1.7e+03;
                                                                                                    DB 1;
                                                                                                  Length 16;
                                                                   Indels
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RESULT 2155 ADD28838/C ID ADD28838 standard; DNA; 16

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16

TTTTATTTTATTTTT 443

0;

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The present invention describes a molecular sub-typing system (S) for Escherichia coli, which comprises observing and recording variable number transfer repeats (VMTR) repeat arrays in an E. coli DNA sample. Also described: (1) VMTR loci (I) for sub-typing E. coli O157:H7; (2) primers (II) for amplifying (I); (3) amplicon comprising (II) and a locus comprising a VNTR sequence from E. coli O157:H7; (4) multiplex cocktails (III) for multiplex amplification of (I) comprising two or more primers (C (III) for multiplex amplification of (I) comprising two or more primers (C (III); (5) kits for molecular sub-typing of E. coli O157:H7 by PCR (C comprising typing reagents for maintaining hybridisation and amplification condition in a PCR instrument (C (vit) DNA from an E. coli strain; (6) kits for molecular sub-typing of E. coli O157:H7 strains by multiplex, comprising (III), and amplifying reagents for maintaining hybridisation and amplification condition in a coli O157:H7 strains by multiplex, comprising (III), and amplifying concording the maplifying comparising the primers for amplifying loci comprising VNTR, where the primers have an observable indicator; (b) obtaining single-stranded sample DNA from the C coli sample to be subtyped; (c) combrising the primers, the sample DNA from the PCR instrument to form amplicons comprising the primers and the VNTR; (d) separated ampliforns; and (f) comparising the primers and the VNTR; (d) separated amplicons; and (f) comparing the evaluation to an evaluation of c separated amplicons; and (f) comparing the evaluation to an evaluation of c separated amplicons; and (f) comparing the evaluation to an evaluation of coli. The present sequence represents an E. coli VNTR loci related coli vention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
                                     Query Match
                                                                           Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        molecular sub-typing system; Escherichia coli; variable number tandem repeat; VNTR; genetic data; epidemiological database; research; gene; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 7; SEQ ID NO 457; 166pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Molecular sub-typing system for Escherichia coli, recording variable number tandem repeat arrays in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (UYÀR-) UNIV ARIZONA.
(KEIM/) KEIM P.
(KEYS/) KEYS C.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      11-DEC-2002; 2002WO-US039914.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              19-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Escherichia coli.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            15-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2003-864934/80.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Keim P,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                11-DEC-2001; 2001US-0339687P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Escherichia coli 0157:H7 VNTR amplicon sequence SEQ ID NO:457
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ADD28838;
Local Similarity 93.8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Keys C;
                                                                           BP; 13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first entry)
                                                                           A; 0 C; 0 G; 3 T; 0 U; 0 Other;
               93.8%;
 0
                     Pred. No.
                                     Score 14.4;
 Mismatches
                 1.7e+03
                                       DB 1;
 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    comprises observing an Escherichia coli
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 Gaps
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The present invention describes a molecular sub-typing system (S) for CC Escherichia coli, which comprises observing and recording variable number trandem repeats (NNTR) repeat arrays in an E. coli DNA sample. Also CC described: (I) VNTR loci (I) for sub-typing E. coli DNA sample. Also CC (II) for amplifying (I); (3) amplicon comprising (II) and a locus CC (III) for amplifying (I); (3) amplicon comprising (II) and alocus CC (III); (5) kits for molecular sub-typing of E. coli O157:H7; (4) primers for CC (III); (5) kits for molecular sub-typing of E. coli O157:H7 by PCR CC comprising primers for VNTR loci in E. coli, and amplifying reagents for CC (III); (5) kits for wolecular sub-typing of E. coli O157:H7 by PCR CC (III); (5) kits for molecular sub-typing of E. coli O157:H7 by PCR CC (III); (5) kits for molecular sub-typing of E. coli O157:H7 by PCR CC (III); (5) kits for molecular sub-typing of E. coli O157:H7 strains by multiplex, comprising (III), and amplifying coli comprising (III), and amplifying of E. coli O157:H7 strains by multiplex, comprising (III), and amplifying condition in a coli o157:H7 strain; and (7) sub crains of comprising (III), and amplifying one or more contition in a molecular sub-typing of E. coli O157:H7 strain; and (7) sub crains of comprising (III), and amplifying one or more contition and E. coli strain, where the primers have an observable indicator; (b) obtaining single-stranded sample DNA from the E. coli sample to be subtyped; (c) combrining the primers, the sample DNA from the CC interest for amplifying reagents under hybridising and amplifying conditions in a pCR instrument to form amplicons comprising the primers and the VNTR; (d) separated amplicons; and (f) comparing the evaluation to an evaluation of amplicons bequence yellows and E. coli version to an evaluation of coli. The present sequence represents an E. coli VNTR loci related amplicons explained in the exemplification of the present coli. (S) is useful for subtyping pathogenic E.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          RESULT 2156
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ADD28839 standard; DNA; 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Molecular sub-typing system for Escherichia coli, comprises observing and recording variable number tandem repeat arrays in an Escherichia coli DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               variable number tandem repeat; VNTR; genetic data; epidemiological database; research; gene; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 7; SEQ ID NO 458; 166pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-864934/80
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  11-DEC-2001; 2001US-0339687P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Escherichia coli.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         molecular sub-typing system; Escherichia coli;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Escherichia coli 0157:H7 VNTR amplicon sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-JAN-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (UYAR-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ) UNIV ARIZONA.
) KEIM P.
) KEYS C.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Keys C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry)
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Best Local Similarity

1.5%;

4; DB 1; 1.7e+03;

Length 16;

Sequence

16

BP; 3 ð

0 C; 0 G; 13 T; 0 U; 0 Other; Score 14.4; Pred. No. 1.

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RESULT 2157
ADD28836/c
CC Escherichia coli, which comprises observing and recording variable number CC tandem repeats (NNTR) repeat arrays in an E. coli DNA sample. Also Cd described: (1) VNTR loci [1] for sub-typing E. coli (0157:H7; (2) primers CC (III) for amplifying (1); (3) amplicon comprising (II) and a locus CC (III) for amplifying (1); (3) amplicon comprising (II) and a locus CC (III) for multiplex amplification of (1) comprising two or more primers CC (III); (5) kits for molecular sub-typing of E. coli (0157:H7 by PCR CC (III); (5) kits for MOLECULAR sub-typing of E. coli (0157:H7 by PCR CC (III); (5) kits for MOLECULAR sub-typing of E. coli (0157:H7 by PCR CC (III); (5) kits for molecular sub-typing of E. coli (0157:H7 by PCR CC (III); (5) kits for man damplification condition in a PCR instrument with DNA from an E. coli strain; (6) kits for molecular sub-typing of E. (coli (0157:H7 strains by multiplex, comprising (III), and amplifying creagents for maintaining hybridisation and amplification condition in a CC respense for amplifying loci comprising (III), and amplifying one or more crupiancer for amplifying loci comprising VNTR, where the primers or more comprises for molecular sub-typing one or more comprising the primers for molecular sub-typed; (c) combining the primers and the VNTR; (d) separated amplicons by size; (e) evaluation to an evaluation of amplificons obtained by PCR from a known E. coli strain. M1 is useful for coli numbers of the present sequence represents an E. coli VNTR loci related coli numbers of the present sequence which is useful for sub-typing pathogenic E.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Molecular sub-typing system for Escherichia coli, comprises observing recording variable number tandem repeat arrays in an Escherichia coli
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ADD28836;
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(KEIM/) KEIM P.
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Best Local Similarity
typing (M1) an E. coli strain, comprising: (a) obtaining one or more primers for amplifying loci comprising VNTR, where the primers have an observable indicator; (b) obtaining single-stranded sample DNA from the E. coli sample to be subtyped; (c) combining the primers, the sample DNA and amplifying reagents under hybridising and amplifying conditions in a PCR instrument to form amplicons comprising the primers and the VNTR; (d) separated amplicons by size; (e) evaluation numbers and sizes of separated amplicons obtained by PCR from a known E. coli strain. M1 is useful for
                                                                                                                                                                                                                                 The present invention describes a molecular sub-typing system (S) for Bscherichia coli, which comprises observing and recording variable number tandem repeats (VMTR) repeat arrays in an E. coli DNA sample. Also described: (1) WNTR loci (I) for sub-typing E. coli O157:H7; (2) primers (II) for amplifying (I); (3) amplicon comprising (II) and a locus comprising a WNTR sequence from E. coli O157:H7; (4) multiplex cocktails (III) for multiplex amplification of (I) comprising two or more primers of (III); (5) kits for molecular sub-typing of E. coli O157:H7 by PCR comprising primers for WNTR loci in E. coli, and amplifying reagents for maintaining hybridisation and amplification condition in a PCR instrument with DNA from an E. coli strain; (6) kits for molecular sub-typing of E. coli O157:H7 strains by multiplex, comprising (III), and amplifying reagents for maintaining hybridisation and amplification condition in a multiplex instrument with DNA from an E. coli O157:H7 strain; and (7) sub-typing of III) and amplifying reagents for maintaining hybridisation and amplification condition in a multiplex instrument with DNA from an E. coli O157:H7 strain; and (7) sub-typing of E. coli o157:H7 strain sub-typing of E. coli o157:H7 strain sub-typing of E. co
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Molecular sub-typing system for Escherichia coli, comprises observing and recording variable number tandem repeat arrays in an Escherichia coli DNA
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Pred. No. 1.7e+03;
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         The invention relates to an isolated nucleic acid (N1) comprising at least 20 but not more than 1500 consecutive nucleotides of the optineurin promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of detecting a single nucleotide polymorphism (SNP) in the optineurin promoter a host cell comprising the promoter operably linked to a heterologous sequence, diagnosing or prognosing glaucoma in a sample obtained from a cell or bodily fluid (comprising glaucoma in a sample obtained from a cell or bodily fluid (comprising detecting a polymorphism in a promoter region of the optineurin gene, associated with a glaucoma phenotype), detecting a SNP sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation in a sample containing DNA, determining the presence or increased susceptibility to glaucoma or to a progressive ocular hypertensive of isolated with a glaucoma or to a progressive ocular hypertensive or progression of glaucoma in a patient, comprising providing applification reaction primers that direct amplification of a selected amplification of a selected containing the presence of inthe net application.
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Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                     New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and relate
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RAYMOND V
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Pred. No. 1.
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1.7e+03;
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nucleic acid region containing the variation

optineurin

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RESULT 2160
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Best Local :
                            The invention relates to an isolated nucleic acid (NI) comprising at least 20 but not more than 1500 consecutive nucleotides of the optineurin promoter appearing as ADE13890. Also included are the optineurin promoter operably linked to a heterologous nucleic acid, a nucleic acid capable of detecting a single nucleotide polymorphism (SNP) in the optineurin promoter, a host cell comprising the promoter operably linked to a heterologous sequence, diagnosing or prognosing glaucoma in a sample obtained from a cell or bodily fluid (comprising detecting a polymorphism obtained from a cell or bodily fluid (comprising detecting a polymorphism in a promoter region of the optineurin gene, associated with a glaucoma phenotype), detecting a SNP sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation in a sample containing DNA, detecting the presence or increased susceptibility to glaucoma or to a progressive ocular hypertensive disorder resulting in loss of visual field in a patient (or the severity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  detecting the polymorphism). The invention is used to diagnose and prognose glaucoma and also to treat glaucoma related disorders. The present sequence is an optineurin promoter motif, repeat element or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             promoter and amplifying the DNA) and detecting a polymorphism (comprising obtaining a sample containing human genomic DNA, providing a nucleic acid capable of detecting a SNP located within an optineurin promoter, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                09-OCT-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               29-JAN-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    06-MAR-2002; 2002US-00091281
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 11; SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       optineurin promoter to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-864168/80
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15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    optineurin; ds; ophthalmological; single nucleotide
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RAYMOND V.
MORISSETTE J.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ucoma; progressive ocular hypertensive disorder; related disorder; motif; repeat element; regula
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         GATTACAGGTGTGAGC 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ID NO 125; 159pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DNA;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      쁌
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Pred. No. 1.7e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          glaucoma and
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or progression of glaucoma

in a patient,

comprising

providing

Query Match Best Local S Matches 15

l Similarity

Conservative

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1.5%;

Score 14.4; D Pred. No. 1.7e 0; Mismatches

7e+03 DB 1;

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RESULT 2161
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           amplification reaction primers that direct amplification of a select pucleic acid region containing the variation within the optineurin promoter and amplifying the DNA) and detecting a polymorphism (compobtaining a sample containing human genomic DNA, providing a nuclei capable of detecting a SNP located within an optineurin promoter, a detecting the polymorphism). The invention is used to diagnose and prognose glaucoma and also to treat glaucoma related disorders. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 16
                       The present invention discloses a method for generating five prime biased tandem tag libraries of cDNAs. The step involves isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags. The present sequence is human NADH dehydrogenase (ubiquinone) Fe-S protein 8 (NADH-coenzyme Q reductase; NDUFS8) tandem tag DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                        Tandem tag; concatenated tag; human; NADH dehydrogenase; Fe-S;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    putative regulatory region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   present sequence is an optineurin promoter motif, repeat element
Sequence 16
                                                                                                                                                Generating five prime biased tandem tag libraries of cDNAs by isola sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating
                                                                                                                                                                                                                                                                                                                             06-MAR-2002; 2002US-00092885
                                                                                                                                                                                                                                                                                                                                                       06-MAR-2002; 2002US-00092885
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human NADH dehydrogenase Fe-S protein 8 (NDUFS8) tandem tag DNA
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                                                                                                             Disclosure; Page 4; Opp;
                                                                                                                                                                                                    WPI;
                                                                                                                                                                                                                             Samal
                                                                                                                                                                                                                                                                               (HERM/)
                                                                                                                                                                                                                                                                                                       (SAMA/)
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HOPPA N L.
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BP; 3
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Pred.
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  0 Other;
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RESULT 2162
AAD63093/c
ID AAD6309
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AAD6309
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AC AAD6309
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Tandem
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Tandem
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Tandem
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To Homo E
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PD 09-OC
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PD 06-MA
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RESULT 2163
AAD63047/c
ID AAD6304
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AC AAD6304
XC AAD6304
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DT 12-FEB-
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Best Local Similarity
Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Generating five prime biased tandem tag libraries of cDNAs by isolating sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the
                         Tandem tag;
                                                               Human ribosomal protein S21 (RPS21) tandem
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 16 BP; 5 A; 6 C; 1 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention discloses a method for generating five prime biased tandem tag libraries of CDNAs. The step involves isolating a sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the concatenated tags.
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                                                                                                                                                                                          AAD63047
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Page 6; Opp;
                       concatenated tag; human;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  sequence is human tandem tag DNA
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RESULT 2164
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Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Generating five prime biased tandem tag libraries of cDNAs by isolating sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 16 BP; 1 A; 3 C; 9 G; 3 T; 0 U; 0 Other;
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                                                                                                                                                                                                                  Tandem tag; concatenated tag; human; ds
                                                                                                                                                                                                                                          Human tandem tag DNA
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                                    (HERM/)
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                     ) SAMAL B.
) LI Y.
) HERMIDA L C.
) HOPPA N L.
) JOHE K K.
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HOPPA N L.
JOHE K K.
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Hoppa NL,
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probes, that are greater than 100 base pairs and that have been derived from genomic nucleic acid, to one or more undestred sequences in an assa for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the mixture of probes (preferably detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the target genomic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention discloses a metho trandem tag libraries of CDNAs. The step mRNAs, amplifying the released tags, co form concatenated tags, amplifying and The present sequence is human tandem tage.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Generating five prime biased tandem tag libraries of cDNAs by isolatin sample of mRNAs, amplifying the released tags, concatenating the amplified tags to form concatenated tags, amplifying and isolating the
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       probe
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                                                                                                                                                                                                  Non-nucleotide probe for suppressing binding of detectable nucleic acid probes to undesired sequences, has aggregate nucleobase sequence homologous to randomly distributed repeat sequence of genomic nucleic
                                                                                                                                                                                                                                                          WPI; 2003-421160/39.
                                                                                                                                                                                                                                                                                      Kirtsen
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                                                                                                                                                        Claim 10; SEQ ID NO 17; 103pp; English.
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The step involves isolating a sam
tags, concatenating the amplified
ying and isolating the concatenated
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ADH59599/c
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              more detectable nucleic acid probes to the target genomic nucleic acid c the sample. The genomic nucleic acid is contained in a fixed tissue or a cell, and the sample is metaphase spreads, interphase nucleic or nucleic found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid reference array. The method comprises treating a sample of genomic nucleic acid and control genomic nucleic acid, which are differentially labelled, the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   of the genomic array is determined by determining the presence, absence, amount or location of the detectable label on the one or more genomic arrays. The genomic array comprises nucleic acid that is prepared from Bacterial Artificial Chromosome (BAC) clones. The present sequence
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                                                                                                                                                                                                                                                     IJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mismatches
                                                                                                                                                                                                                                                        Williams
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   #3.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0 Other;
                                                                                                                                                                                                                                                        BF
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ntained in a fixed tissue or a interphase nucleic or nucleic or frozen tissue or a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0
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homologous acid.

Non-nucleotide probe for suppressing binding of detectable nucleic acid probes to undesired sequences, has aggregate nucleobase sequence homologous to randomly distributed repeat sequence of genomic nucleic

Claim 10; SEQ ID

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5; 103pp; English

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ABX14989/c
ID ABX149
XX
AC ABX149
AC ABX149
XX
II 14-MAR
XX
Human;
KW Human;
KW energy
XX
OS Homo s
XX
W 02002
XX
PD 21-NOV
XX
PF 13-MAY
XX
XX
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        RESULT 2167
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    control genomic involence acray with the sample and control genomic nucleic acid and, the array with the sample and control genomic nucleic acid and, the array with treated mixture of sample and control genomic nucleic acid under suitable hybridization conditions, contacting the array with treated mixture of sample and control genomic nucleic acid under suitable hybridization conditions, and comparing the intensities of the signals from the differential labels of the array to that caused by hybridization of the probes to genomic nucleic acid, thus determining one or more variations in copy numbers of sequences in the sample as compared with the relative copy numbers of sequences in the control. The hybridization of the genomic determined using an intercalating dye or a detectable antibody, or its fragment, that is specific for a nucleic acid/nucleic acid hybrid. The sample of genomic nucleic acid to be tested and the reference of nucleic acid are labelled with detectable moiety such that hybridization of the genomic array is determined by determining the presence, absence, amount or location of the detectable label on the one or more genomic arrays. The genomic array comprises nucleic acid that is prepared from the control are intercable acid and that is prepared from the control array is determined by determining the presence formerce.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                more detectable nucleic acid probes to the target genomic nucleic acid of the sample. The genomic nucleic acid is contained in a fixed tissue or a cell, and the sample is metaphase spreads, interphase nucleic or nucleic found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid withe that of a control sample using a sample of genomic nucleic acid with the method comprises treating a sample of genomic nucleic acid and control genomic nucleic acid, which are differentially labelled, the array or both the sample and control genomic nucleic acid, which are differentially labelled, the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the one or more detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the hybridization of the one nucleic acid of the sample by determining the hybridization of the one
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present sequence represents a non-nucleotide probe. The probe is useful for suppressing the binding of one or more detectable nucleic acid probes, that are greater than 100 base pairs and that have been derived from genomic nucleic acid, to one or more undesired sequences in an assay
                               11-MAY-2001; 2001US-0290016P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 16
                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                       energy homeostasis disorder; chromosome 1.
                                                                                                                                                                                                                                                                                                                                                                                                             Human delta opioid receptor OPRD1-1 SNP genotyping PCR primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ABX14989 standard; DNA; 16 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      arrays. The genomic array comprises nucleic acid that is pacterial Artificial Chromosome (BAC) clones. The present
                                                                               13-MAY-2002; 2002WO-US014940
                                                                                                                                                                                                                                                                                                                                single
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      14-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               represents a non-nucleotide probe of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          843 CCTGCCTCGGCCTCCC 858
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       16
                                                                                                                                                                                                                                                                                                                                delta opioid receptor; OPRD1-1; ss; PCR; primer; nucleotide polymorphism; eating disorder; anorex:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP; 2 A; 3 C; 11 G; 0 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14.4; DB 1; Length 16; Pred. No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Mismatches
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871 15;

TTACAGGCGTGAGCCA 886 Conservative

0

Mismatches

1;

Indels

0,

Gaps

0

Matches

맑

16

RESULT 2168

ABT34281/c
ID ABT342
XX
AC ABT342
XX
DT 12-UUN
XX
Opioid
XX
Eating
KW Eating
KW Earting
KW anorex
XX
Uniden
XX
Uniden
XX
Uniden
XX
IN U

Unidentified

WO2003012143-A1

Eating disorder; polymorphism; dataset; allele; HGBASE identific serotonin receptor 1D; delta-opioid receptor; dopamine receptor anorexia nervosa; bulimia nervosa; PCR; primer; ss.

Opioid receptor D1 PCR primer SEQ ID No

67.

identification;

12-JUN-2003 (first entry)

ABT34281;

ABT34281 standard; DNA; 16 BP

16-JUL-2001; 2001US-0305153P.
20-JUL-2001; 2001US-0306440P.
13-NOV-2001; 2001US-0331285P.
19-DEC-2001; 2001US-0340843P.

16-JUL-2002;

2002WO-US022555

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cc encoded by the nucleic acid, an isolated antibody that specifically correcognises the delta opioid receptor variant, a vector comprising the culcic acid, a host cell transformed to contain the vector, producing cc nucleic acid, a host cell transformed to contain the vector, producing cc the polypeptide by culturing the host cell, identifying an agent which cc modulates the expression of the nucleic acid, diagnosing a genetic correction of the nucleic acid, diagnosing a genetic correction of the presence of the variant nucleic acid in a patient sample, can allele specific primer that detects a polymorphism in the gene ce encoding a delta opioid receptor associated with an eating or energy contain the variant nucleic acids. The variants are named OppDI-1 to contain the variant nucleic acids. The variants are named OppDI-1 to contain the variant opioid receptor gene is located on chromosome 1. The nucleic acid molecules and delta opioid receptor variant are useful for contains a genetic predisposition to an eating or energy homeostasis contains a genetic predisposition to an eating or energy homeostasis contains a such as anorexia nervosa. The allele specific primer is useful contains the disorder cited. The present sequence is a genotyping contains the disorder cited. The present sequence is a genotyping contains an entire of the contains and contains and contains a contain
Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to an isolated nucleic acid molecule encoding a delta opioid receptor variant associated with an eating or energy homeostasis disorder. Also included are a delta opioid receptor variant
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New isolated nucleic acid molecule encoding a delta opioid receptor variant associated with an eating or energy homeostasis disorder, useful for diagnosing a genetic predisposition to such disorder, e.g. anorexia
                                                                                                      Sequence 16 BP; 4 A;
                                                                                                                                                                    associated with the disorder cited. The pre-
PCR primer for detecting the presence of a
nucleotide polymorphism) in a sample
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example; Page 19; 39pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    nervosa.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-129306/12
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (BIOI-) BIOINVEST LTD
1.5%;
                                                                                                      5 C; 3 G; 4 T; 0 U; 0 Other;
   Score 14.4;
Pred. No. 1.
1.7e+03;
                                        DB 1;
                                                                                                                                                                                                            particular SNP
                                    Length 16;
                                                                                                                                                                                                                (single
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to a novel isolated nucleic acid molecule comprising a variant gene associated with an eating disorder and selected from any of 119 polymorphisms with their corresponding genotyping in dataset, alleles and HGBASE identification, given in the specification. The novel nucleic acid molecule has polymorphisms in the serotonin receptor 1D, delta-opioid receptor, or dopamine receptor D2, which is useful in diagnostic and prognostic assays for eating disorders, in particular anorexia nervosa and bulimia nervosa. This polymorlectide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New nucleic acid molecule having polymorphisms in the serotonin receptor 1D, delta-opioid receptor, or dopamine receptor D2, useful in diagnostic and prognostic assays for eating disorders, such as anorexia and bulimia
                                                                                                                                                                                                                                              Addison's disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; degenerative nervous system disease; disease; type I hypersensitivity disease; type I hypersensitivity; allergy; type II hypersensitivity; Goodpasture's syndrome; allergy; type II hypersensitivity; leprosy; infections disease; viral infection; type IV hypersensitivity; leprosy; infection; schistosome; HIV; fungal infection; Candida; parasitic infection; schistosome; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            19-DEC-2001; 2001US-0340844P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ADH70278;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 3;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Bergen
                                                                                                                                                                        US2002150891-A1
                                                                                                                                                                                                     Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                          Human Vbeta gene repeat sequence #68.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         25-MAR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ADH70278 standard; DNA; 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (PRIC-) PRICE FOUND LTD
                 (HOOD/)
(ROWE/)
                                                                                                                                                                                                                                                                                                                                                                            degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease;
                                                                                                                                                                                                                                                                                                                                                                                                            human;
                                                              19-SEP-1994;
19-SEP-1995;
                                                                                                             05-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 2003-268122/26
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 871
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AW,
                                                                                                                                                                                                                                   cancer;
                                                                                                                                                                                                                                                                                                                                                                                                            T-cell associated disease; Vbeta; autoimmune disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15;
                 HOOD L E.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          represents a opioid receptor 1D PCR primer of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TTACAGGTGTGAGCCA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              TTACAGGCGTGAGCCA 886
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Page 60; 149pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 4 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Yeager M
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.5%;
llarity 93.8%;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
                                                              94US-00309335.
95US-00531241.
                                                                                                             99US-00263959.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              5 C; 3 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Gaps
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associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, vbetaRNA or cDNA. The kit is useful for diagnosing organ transplant rejection and diagnosing and treating T-cell associated diseases including autoimmune diseases, degenerative nervous system diseases, graft versus host disease, hypersensitivity diseases, infectious diseases and neoplastic diseases. Autoimmune diseases include Addison's disease, arrophic gastritis. Degenerative nervous system diseases include multiple sclerosis and Alzheimer's disease. Hypersensitivity diseases include Type I hypersensitivities such as contact with allergens that lead to
                                                                                     allergies. Type II hypersensitivities such as those present in Goodpasture's syndrome and Type IV hypersensitivities such as those manifested in leprosy. Infectious diseases include viral infections caused by viruses such as HIV, fungal infections such as those caused by the yeast genus Candida, parasitic infections such as those caused by schistosomes, filaria and bacterial infections such as those caused by Mycobacterium. Neoplastic diseases include lymphoproliferative diseases such as leukaemias, lymphomas and cancers such as cancer of the brain, breast. The present sequence represents a Vbeta gene repeat sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Kit for diagnozing and treating T-cell associated diseases e.g. autoimmune, degenerative nervous system and infectious disease, comprises nucleic acid primers specifically priming and allowing amplification of a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2004-059052/06
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Hood LE, Rowen
Sequence 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         invention relates to a kit
     BP; 13 A; 0 C; 0 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    SEQ ID NO 472; 164pp; English.
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rises a panel of nucleic acid
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RESULT 2170
ADQ30362
                                                                                                                                                                                                                                                                                                                                                                                             Matches
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Best Local
                                                           hypalgesia; hyperalgesia; neuralgia;
                                                            pain transmission; primary sensory neuron; transcription factor
detection; MZF1; NFkappaB; NFAT; GATA1; sensitivity disorder;
hypalgesia; hyperalgesia; neuralgia; myalgia; human.
                                                                                                            ds; VR1 receptor; vanilloid receptor type 1; modulator;
                                                                                                                                            Human VR1 exon 1d transcription factor binding fragment
                                                                                                                                                                              09-SEP-2004
                                                                                                                                                                                                                                             ADQ30362 standard; DNA;
WO2004053120-A2
                              Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                            430
                                                                                                                                                                                                                                                                                                                              16
                                                                                                                                                                                                                                                                                                                                                                                             15;
                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                                                                                                                                                            TTATTTTATTTTATTT
                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
93.8%;
                                                                                                                                                                                                                                              16
                                                                                                                                                                                                                                                                                                                                                              445
                                                                                                                                                                                                                                                                                                                              1
                                                                                                                                                                                                                                                                                                                                                                                              <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                             Score 14.4; DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                               Pred.
                                                                                                                                                                                                                                                                                                                                                                                              Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                            No. 1.7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                           Length
                                                                                                                                                                                                                                                                                                                                                                                              Indels
                                                                                                                                                                                                                                                                                                                                                                                                                              16;
                                                                                              factor;
                                                                                                                                                                                                                                                                                                                                                                                              0
                                                                                 analgesia;
                                                                                                                                                                                                                                                                                                                                                                                              Gaps
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WPI; 2004-468868/44

Weihe

Bieller A,

Schaefer MKH;

(CHEF)

GRUENENTHAL

GMBH

09-DEC-2002; 2002DE-01057421 01-DEC-2003; 2003WO-EP013522

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AAQ95863
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                RESULT 2171
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              positions 221931-22334 of GemBank RL670399, 31673-3359 of RL663116, or 44731-43231 or 36616-33151 of AF168787 and is involved in transmission of pain, particularly in primary sensory neurons. The involved in transmission of describes a vector that contains the VR1 modulator, host cells containing this vector (other than human germ or embryonal stem cells) and a method for modulating expression of the VR1 receptor by introducing the modulator or the vector into a cell that contains the VR1 gene. The modulator or the vector into a cell that contains the VR1 gene. The products of the invention are used for detecting a transcription factor from its binding to a regulatory sequence (or a double-stranded coligonucleotide fragment of it), e.g. by Western blotting or enzymelinked immunosorbant assay, particularly for diagnosis of diseases a binding site for a transcription or underexpression of the transcription factor. The region that modulates VR1 receptor expression includes a binding site for a transcription factor, e.g. MZF1, NFKappaB, NFAT or GATA1. The nucleic acids of the invention, or vectors containing them, can used for prevention or treatment of pain, also for treating sensitivity disorders, e.g. analgesia, hypalgesia or hyperalgesia, also neuralgia and myalgia, that are associated with activity of the VR1 which is capable of hidding treatment of factor.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     This invention describes a novel nucleic acid containing a specific segment having at least one region that modulates expression of the VR (vanilloid receptor type 1) receptor, or a functional destivative, alle or fragment of this region, or a sequence that hybridises to it under standard conditions. The VRI modulator is derived from one or more of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New nucleic acid that modulates expression of the vanilloid receptor-1, useful for control of pain or sensitivity disorders, comprises sequences from control regions of the receptor gene.
                                                                                                                                                                                                                                                                                                                              primer; polymerase chain reaction; PCR; linkage study; locus;
microsatellite marker sequence; automated genotyping; allele;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 16 BP; 4 A; 6 C; 4 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page 53; 68pp; German.
WPI; 1995-215278/28.
                                      Levitt
                                                                                                                  03-DEC-1993;
                                                                                                                                                       05-DEC-1994;
                                                                                                                                                                                             08-JUN-1995.
                                                                                                                                                                                                                                   WO9515400-A1
                                                                                                                                                                                                                                                                                                            polymorphism;
                                                                                                                                                                                                                                                                                                                                                                                         Primer A (Group 11,
                                                                                                                                                                                                                                                                                                                                                                                                                               21-FEB-1996
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAQ95863
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAQ95863 standard; DNA; 17
                                                                          AIND (OCAD)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            738 GACTACAGGCGCCCAC 753
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    is capable of binding to a transcription factor.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               l Similarity
15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        GACTACAGGTGCCCAC 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                            JOHNS HOPKINS
                                                                                                                                                                                                                                                                                                            detection; Homo sapiens; ss
                                                                                                                  93US-00160837
                                                                                                                                                       94WO-US013945
                                                                                                                                                                                                                                                                                                                                                                                         set B)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ВP
                                                                                                                                                                                                                                                                                                                                                                                    for marker D13S217, chromosome 13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                            automated genotyping; allele;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .7e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
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Novel ribozymes for modulating the synthesis, of an mRNA encoding an angiogenic factors.

expression and/or stability

WPI; 1999-591315/50.

24-MAR-1999; 07-OCT-1999 WO9950403-A2 Homo sapiens

27-MAR-1998;

98US-0079678P 99WO-US006507

(RIBO-) RIBOZYME PHARM INC.

Roberts E,

Jarvis T,

Coeshott C,

Mcswiggen

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RESULT 2172
AAA22692
ID AAA2269
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Query Match
Best Local (
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                                                                                                                                                                                                                                                                                                                                integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic, ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               polymorphic, simple sequence repeats and can be used in automated genotyping. esp. fluorescence-based. The primers correspond to the unique DNA sequence surrounding each marker, and PCR is used to detect each polymorphism. When the MMS show considerable polymorphism (i.e. a difference in the number of repeats) between individuals, the markers can be particularly informative. The MMS can be ideal for linkage studies. Kits comprise at least 4 groups, of at least 3 sets, each comprising labelled primers for PCR amplification of the DNA. Group 11 primer pairs are shown in AAQ95841-82. The published size range of the D13S217 allele is 160-174 bp, and the degree of heterozygosity in the population is
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The method aims to provide a collection of highly reproducible microsatellite marker sequences (MMS) at approx. 10-50 cM intethroughout the human genome which can be detectably labelled.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Kit for automated genotyping contg. pairs of PCR primers - designed amplify polymorphic nucleotide repeat sequences, arranged in sets with a characteristic fluorescence label, useful e.g. in detection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             disease related genetic rearrangement.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; aryl hydrocarbon nuclear transport;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17 BP; 4 A; 4 C; 6 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Fig 7K-2; 104pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Integrin subunit beta 3 substrate sequence SEQ ID NO:5918.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAA22692;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAA22692 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                393 TGCTGGGATTACAGGC 408
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      678
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  N
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.5%;
Similarity 93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TGCTGGGATCACAGGC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ARNT;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TIE-2; angiogenesis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          intervals
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              designed
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            The MMS are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ed to
each
n of
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Claim 54; Page 236; 305pp; English

WPI; 1999-591315/50

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AAA22724

AAAC

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         RESULT 2173
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              19-JUN-2000 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAA22724 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu synand other syndromes and diseases related to the levels of ARNT,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Integrin subunit beta 3 substrate sequence SEQ ID NO:5950.
                                                                                                                                                                                                                                                                                                                                                                                       WO9950403-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                            Pavco
                                                                                                                                                                                27-MAR-1998;
                                                                                                                                                                                                                                                  24-MAR-1999;
                                                                                                      (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Local Similarity
les 2; Conserv
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                                        PA,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   UUUUAUUUUAUUAUUU 16
                                    Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 4 A;
                                                                                                                                                                                98US-0079678P
                                                                                                                                                                                                                                                  99WO-US006507
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                                    Jarvis T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0 T; 13 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
                                        Coeshott C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1; Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0 Other;
                                    Mcswiggen JA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0,
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The present invention describes enzymatic nucleic acid molecules with RNA cc cleaving activity, which specifically cleave RNA encoded by an aryl converse of the present respect of the present ribration and the present respect of the present and the print subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to cc AAA17167 and AAA17561 to AAA17622 represent ribration gene esquences for ARNT, cc and AAA17168 to AAA17560 and AAA17622 represent ribration to cc corresponding target sequences, AAA17685 to AAA18385 and AAA19087 to cc AAA19154 represent ribration sequences, AAA17685 to AAA18386 to AAA19086 cc AAA19154 represent ribration sequences, and AAA18386 to AAA19086 cc and AAA19155 to AAA19222 represent their corresponding target sequences, cc AAA19233 to AAA20361 and AAA21501 to AAA21555 represent ribration and cc gequences for integrin alpha 6 subunit, and AAA2036 to AAA21500 and cc AAA21596 to AAA21688 represent their corresponding target sequences; cc AAA21689 to AAA22475 and AAA23363 to AAA23342 represent ribration sequence of cc for integrin subunit beta 3, and AAA23476 to AAA23262, AAA23343 to AAA23343 to AAA23476 to AAA23476 to AAA23343 to AAA23343 to AAA23476 to AAA23476 to AAA23343 to AAA23476 to AAA23476 to AAA23343 to AAA23476 to AAA23476 to AAA23476 to AAA23476 to AAA23476 to AAA23343 to AAA23476 to
                                                                   AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel ribozymes for modulating the synthesis, expression and/or stability of an mRNA encoding an angiogenic factors.
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RESULT 2174
AAA22753
                                                                                                                                                    Matches
                                                                                                                                                                Query Match
Best Local
19-JUN-2000
                                              AAA22753 standard; RNA; 17 BP
                                                                                                                                                                                                  Sequence 17 BP; 2 A;
                                                                                                                                679 TGCAACCTCTGCCTCC 694
                                                                                                                                                                 Similarity
                                                                                                        UGCAACUUCUGCCUCC 16
                                                                                                                                                      Conservative
(first entry)
                                                                                                                                                                 68.8%;
                                                                                                                                                                                                   7 C; 2
                                                                                                                                                                                                   G; 0 T; 6 U;
                                                                                                                                                       4
                                                                                                                                                                 Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                    0 Other
                                                                                                                                                                              DB 1;
                                                                                                                                                                            Length 17;
                                                                                                                                                       Indels
                                                                                                                                                       0;
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PR PF FF

27-MAR-1998; 24-MAR-1999;

98US-0079678P 99WO-US006507. 07-OCT-1999 WO9950403-A2 Homo sapiens Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;

Integrin subunit beta 3 substrate sequence

SEQ ID NO:5979.

myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss

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RESULT 2175
AAA22691
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17655 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA21861 and AAA21501 to AAA21555 represent ribozyme sequences; CC AAA12323 to AAA22361 and AAA21501 to AAA21555 represent ribozyme sequences; CC AAA12686 to AAA22168 represent their corresponding target sequences; CC AAA21689 to AAA22168 represent their corresponding target sequences; CC AAA21689 to AAA22165 and AAA23561 to AAA23342 represent ribozymes of the invention are used for modulating the synthesis, expression and/or CC CAA21689 to AAA22475 and AAA23263 to AAA23342 represent ribozymes of the invention are used for modulating the synthesis, expression and/or CC categorially used to treat cancer, diabetic retiropathy, age related CC especially used to treat cancer, diabetic retiropathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as convension of tuberous solerosis, pot-wine stains, Sturge Weber CC syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, integrin subunit befa-3 or integrin subunit hera-3 or integrin subun
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local
                                                                                                                                                                          integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      of an mRNA encoding
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                       WO9950403-A2
                                                                  Homo sapiens
                                                                                                                                  myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 17
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                                                                                                             Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu
                                                                                                                                                                                                                                                                                            Human; aryl
                                                                                                                                                                                                                                                                                                                                          Integrin subunit beta 3 substrate sequence SEQ ID NO:5917.
                                                                                                                                                                                                                                                                                                                                                                                       19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              AAA22691 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ribozymes for modulating the synthesis, expression and/or stability {\sf mRNA} encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         797 CACCATGTTCGCCAGG 812
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                                                                                                                                                                                                                                                                                               hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 3 A; 6 C; 5
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                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
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Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                T; 3 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              .8e+03;
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RESULT 2176
AAA22960/c
ID AAA2296
XX AAA2296
XC AAA2296
XC Integri
XX Integri
XX Human;
XW integri
XX Human;
XW integri
XX Human;
XW integri

Integrin subunit beta 3 substrate sequence

SEQ ID NO:6186.

19-JUN-2000

(first entry)

AAA22960;

AAA22960 standard; RNA; 17

Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;

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Matches Query Match Best Local

l Similarity 2; Conserv

Conservative

12.5%;

Score 14.4; Pred. No. 1 Mismatches

1.8e+03; DB 1;

Length 17; Indels

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Gaps

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428 TTTTATTTTATTTTT

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CC hydrocarbon nuclear transporter (ARMT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie 2 gene. AAA16775 to AAA17622 represent ribozyme sequences for ARMT. CC corresponding target sequences; AAA17685 to AAA16385 and AAA19087 to CC corresponding target sequences; AAA17685 to AAA13836 and AAA19087 to CC AAA19154 represent ribozyme sequences; AAA17685 to AAA18386 to AAA19086 cC AAA19154 represent ribozyme sequences for Tie-2, and AAA18186 to AAA19086 cC AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme cC sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21689 represent their corresponding target sequences; CC AAA21596 to AAA22475 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23343 to CC AAA2342 represent their corresponding target sequences. The ribozymes of the invention are used for modulating target sequences. The ribozymes of corresponding subunit beta 3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related corresponding represent cancer, diabetic retinopathy, age related corresponding subunit alpha-6, or Tie-2. They are neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, candiofibroma of tuberous sclerosis, pot-wise stains, Sturge Weber candions solverome. Weber sendu syndrome.
Sequence 17 BP; 4 A; 0 C; 0 G; 0 T; 13 U;
                                          syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The present invention describes enzymatic nucleic acid mo cleaving activity, which specifically cleave RNA encoded
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 54; Page 236; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          27-MAR-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Roberts E,
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  0 Other;
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RESULT 2177
AAA22965/c
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CC hydrocarbon nuclear transporter (ARNT) gene, an integrin albha 6 subunit gene, or a Tie-2 gene. AAA17757 to

CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT,

CC and AAA17168 to AAA17560 and AAA17633 to AAA17684 represent their

CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to

CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to

CC aAA19155 to AAA19222 represent their corresponding target sequences;

CC aAA19233 to AAA2361 and AAA21501 to AAA21595 represent ribozyme

CC AAA19233 to AAA2361 and AAA21501 to AAA21595 represent ribozyme

CC AAA21698 to AAA21688 represent their corresponding target sequences;

CC AAA21689 to AAA21675 and AAA23263 to AAA2332 represent ribozyme sequence

CC AAA21689 to AAA22475 and AAA23263 to AAA2332 represent ribozyme so

CC AAA21689 to AAA22475 and AAA23263 to AAA2332 represent ribozymes of

CC AAA21689 to AAA22475 and AAA23263 to AAA23343 to

CC CAA21689 to AAA22475 and AAA23263 to AAA23343 represent ribozymes of

CC CAA21689 to AAA22475 and AAA23263 to AAA23343 represent ribozymes of

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention describes enzymatic nucleic acid molecules with RNA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 17 BP; 4 A; 4 C; 5 G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 54; Page 253; 305pp; English.
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Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD;
                                                                                                                                                      19-JUN-2000
                                                                                                                                                                                                                                        AAA22965
                                                                                                        Integrin subunit beta 3 substrate sequence SEQ ID NO:6191.
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                                                                                                                                                                                                                                                                                                                                                   CTTCCCAAAGTGCTGG
                                                                                                                                                                                                                                        standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
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Pred. No. 1.8e+03;
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                                             TIE-2; angiogenesis,
3; hairpin ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 17;
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CC cleaving accivity, which specifically there are submit beta 3 pydrocarbon nuclear transporter (ARNY) gene, an integrin submit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNY, can AAA17168 to AAA17168 to AAA17168 represent their cc corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19125 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and AAA21595 to AAA21488 represent their corresponding target sequences; AAA19223 to AAA22475 and AAA22363 to AAA23362 to AAA23362 to AAA23363 to AAA2363 to AAA2363 to AAA2363 to AAA2363 to AAA2363 to AAA2363 to AA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 54; Page 253; 305pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  PA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Coeshott C,
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Sequence 17 ₿₽; 5 A; 5 C; 5 G; 0 T; 2 U; 0 Other;

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BXAXAXB
                                                    AAA22975
                                                             RESULT 2178
                                                                                                                 Matches
                                                                                                                               Query Match
                              AAA22975
                                            AAA22975
                                                                                                                        Local
                                                                                                 212 TEGTCTCGAACTCCCG 227
                                                                                    17
                                                                                                                 15;
                                                                                                                        Similarity
                                             standard; RNA; 17
                                                                                    TGGTCTCGAACTCCTG 2
                                                                                                                 Conservative
                                                                                                                        1.5%;
                                                                                                                 0
                                                                                                                        Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                   Mismatches
                                                                                                                                 DB 1;
                                                                                                                                Length 17;
                                                                                                                   Indels
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0

Integrin subunit beta 3 substrate sequence SEQ ID NO:6201.

19-JUN-2000

(first entry)

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                                                                                                                                                                                          The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 CC and AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19232 to AAA21501 to AAA21501 to AAA21502 represent ribozyme CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21596 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA22475 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA23343 to CC aAA33422 represent their corresponding target sequences. The ribozyme of the invention are used for modulating the synthesis, expression and/or CC cabality of an mRNA encoding angiogenic factor, especially ARNT, CC especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as cc especially come, kippel-Trenaunay-Weber syndrome, Sturge Weber CC and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                                            Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; ss. kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Novel ribozymes for modulating the synthesis, expression and/or stability of an mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 1999-591315/50
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                                                                                                                                                            Sequence
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                     603 TTTATTTTTAATTTTT 618
  17
                                                                                                 Similarity
                                                                                                                                                               17
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                                                                                                                                                            B₽;
                                                                                Conservative
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                                                                                                                                                            14
                                                                                                 1.5%;
                                                                                                                                                            A; 0 C; 0 G;
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                                                                            0
                                                                                                 Score 14.4;
Pred. No. 1.
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                                                                                                                                                            0 T; 3 U; 0 Other;
                                                                                Mismatches
                                                                                                 1.8e+03
                                                                                                                      DB 1;
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                                                                                                                  Length 17;
                                                                              Indels
                                                                            0
                                                                          Gaps
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AAA22835 ID AAA2 XX

AAA22835 standard; RNA; 17 BP

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1034 CTGGGATTACGGGCAC 1049

0

RESULT 2179

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The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17188 to AAA17680 and AAA17685 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19386 to AAA19086 CC and AAA19155 to AAA12222 represent their corresponding target sequences; CC AAA19223 to AAA21501 to AAA21501 to AAA21502 represent ribozyme sequences; CC AAA19223 to AAA21501 and AAA21501 to AAA2155 represent ribozyme sequences; CC AAA21589 to AAA21688 represent their corresponding target sequences; CC AAA21589 to AAA22163 and AAA23263 to AAA23237 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to AAA23422 represent their corresponding target sequences. The ribozyme sof CC AAA21689 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sof CC AAA21689 to AAA22475 and AAA23263 to AAA23343 to AAA23422 represent ribozyme sof CC CAAA21689 to AAA22475 and AAA23263 to AAA23422 represent ribozyme sof CC CAAA21689 to AAA23422 represent their corresponding target sequences. The ribozyme sof CC CAAA21689 to AAA23422 represent their corresponding target sequence The ribozyme sof CC CAAA21689 to AAA23420 and AAA23423 represent ribozyme sof CC CAAA23422 represent their corresponding target sequence The ribozyme sof CC CAAA23422 represent their corresponding target sequence The ribozyme sof CC CAAA23422 represent their corresponding target sequence of The ribozyme sof CC CAAA23423 and CC CAAA2342 represent their corresponding target sequence of The ribozyme sof CC CAAA2344 and CC C
  Best Loc
Matches
                                             Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; halipin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory, antiarthritic; antiporiatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; ss. Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Claim 54; Page 245; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   of an mRNA encoding an angiogenic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Integrin subunit beta 3 substrate sequence SEQ ID NO:6061
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                AAA22835;
                                                                                             Sequence 17 BP; 4 A; 4 C; 6 G; 0 T;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                             integrin subunit alpha-6, or integrin subunit beta-3
                      Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ribozymes for modulating the synthesis,
                         Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
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                      1.5%;
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ω
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                      Score 14.4; DB 1
Pred. No. 1.8e+03
     Mismatches
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                                                                                                з U;
                                                                                                  0 Other
                                                  DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             expression and/or stability
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mcswiggen
                                                Length 17;
     Indels
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  Gaps
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RESULT 2180
AAA22833
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                                                                                                                                                                                                                                                                                                                                                                                     cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17560 and AAA17623 to AAA17884 represent their corresponding target sequences; AAA17885 to AAA18385 and AAA19087 to AAA19184 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and AAA21508 to AAA21688 represent their corresponding target sequences; AAA21596 to AAA21688 represent their corresponding target sequences; AAA21596 to AAA22367 and AAA23363 to AAA23363 AAA23363 to AAA23363 AAA23363 To AAA23363 AAA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                       AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNY, integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARND), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             of an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 1999-591315/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Pavco PA, Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 27-MAR-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Integrin subunit beta 3 substrate sequence SEQ ID NO:6059
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAA22833 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 54; Page 245; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention describes enzymatic nucleic acid molecules with RNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ribozymes for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         mRNA encoding
                                                                subunit alpha-6,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          modulating the synthesis,
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                                                             or integrin subunit beta-3
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Query Match 1.5 Best Local Similarity 75.0 Matches 12; Conservative

1.5%;

Score 14.4; DB 1, Pred. No. 1.8e+03; Mismatches

DB 1;

Length 17; Indels

<u>;</u> Gaps

0;

alpha-6,

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Sequence 17 BP;

3 A;

4 C; 6 G; 0 T; 4 U; 0 Other;

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                                  The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl C cleaving activity, which specifically cleave RNA encoded by an aryl C cleaving nuclear transporter (ARNT) gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, C corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19386 to AAA19086 cc and AAA19155 to AAA19222 represent their corresponding target sequences; C AAA191523 to AAA21591 to AAA21591 to AAA21595 to AAA21595 to AAA21595 represent ribozyme sequences; c AAA21595 to AAA21596 to AAA21598 represent their corresponding target sequences; c AAA21689 to AAA22168 represent their corresponding target sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to C AAA23422 represent their corresponding target sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to C AAA23422 represent their corresponding target sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to C AAA23422 represent their corresponding target sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to C AAA23422 represent their corresponding target sequence for integrin subunit beta 3, and AAA22476 to AAA23363 represent ribozymes of the invention are used for modulating the synthesis, expression and/or c integrin subunit beta 3, integrin subunit alpha 6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related c macular degeneration (ARMD), inflammation, and arthritis, as well as meld as a self-cosis, pot-wine stains, Sturge Weber c spiderome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              RESULT 2181
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiotibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAA22735 standard; RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Claim 54; Page 239; 305pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               of an mRNA encoding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Novel
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 1999-591315/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pavco PA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  24-MAR-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Jarvis T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Coeshott C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        expression and/or stability
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Sequence 17

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A; 4 C; 6 G; 0 T; 4 U; 0 Other;

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     The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a fie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17562 to AAA17684 represent their CC corresponding target sequences, AAA17685 to AAA18985 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC aAA19154 represent ribozyme sequences for Tie-2, and AAA19086 CC and AAA19155 to AAA12922 represent their corresponding target sequences; CC AAA19223 to AAA21861 and AAA21501 to AAA21595 represent ribozyme CC sequences for integrin alpha 6 subunit, and AAA23362 to AAA21500 and CC aAA21589 to AAA21688 represent their corresponding target sequences; CC AAA21589 to AAA22468 represent their corresponding target sequence CC aAA21589 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sequence CC aAA21689 to AAA22475 and AAA23263 to AAA2362, AAA23343 to CC AAA23422 represent their corresponding target sequences; CC AAA21689 to AAA22475 and AAA23263 to AAA23462, AAA23343 to CC AAA23422 represent their corresponding target sequences. The ribozymes of CC integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to CC CC AAA2342 represent their corresponding target sequences. The ribozymes of CC integrin subunit beta 3, and AAA23476 to AAA23476, AAA23343 to CC CC AAA2342 represent their corresponding target sequences. The ribozymes of CC aAA2342 represent their corresponding target sequences. The ribozymes of CC aAA2342 represent their corresponding target sequences. The ribozymes of CC aAA2342 represent their corresponding target sequences. The ribozymes of CC aAA2342 represent their corresponding target sequences. The ribozymes of CC aAA2343 represent their corresponding target sequences. The ribozymes of CC aAA23434 represent their corresponding target sequenc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   RESULT 2182
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antisporiatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 54; Page 244; 305pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 1999-591315/50
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Integrin subunit beta 3 substrate sequence SEQ ID NO:6044
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ribozymes for modulating the synthesis, expression and/or stability
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     PA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            12;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       98US-0079678P
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75.0%;
myopic degeneration,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Jarvis T, Coeshott C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     17
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Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mismatches
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verruca vulgaris
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          with a target sequence and contain at least one phosphoro(di)thioate clink, having endonuclease activity. (A), and more generally any catalytic nucleic acid (A') that modulates expression of the oestrogen receptor gene, are used to treat cancer (particularly of breast or endometrium), compared to the conditions associated with levels of oestrogen receptor. CC for other conditions associated with levels of oestrogen receptor. CC Because of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, particularly for identification of therapeutic targets, and as research creagents (for RNA, in the same way that restriction endonucleases are used with DNA). The combination of modifications in (A) improves represent oestrogen receptor hairpin thozyme sequences, and AAA24748 to AAA25992 represent their corresponding target sequences. AAA24748 to AAA25902 represent their corresponding target sequences. AAA25993 to AAA26105 represent oestrogen receptor hairpin ribozyme sequences. CC sequences, and AAA26107 to AAA26218 represent their corresponding target sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local S
Matches 13
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndand other syndromes and diseases related to the levels of ARNT, T
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Oestrogen receptor; c-raf; k-ras; bcl-2; ribozyme; cleavage; hammerhead ribozyme; hairpin ribozyme; antisense oligonucleotide; gene expression modification; cancer; phosphorothioate; endonuclease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 17 BP; 4 A; 4 C; 7
                                                                                                                                                                                                                                                                                          The present invention describes nucleic acids (A) that interact stably
                                                                                                                                                                                                                                                                                                                          Claim 77; Page 71; 148pp; English.
                                                                                                                                                                                                                                                                                                                                                               need
                                                                                                                                                                                                                                                                                                                                                                             New nucleic acids that interact,
                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2000-013248/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Thompson JD,
Reynolds M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    20-APR-1998;
23-JUN-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         anticancer; breast cancer; endometrium cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Oestrogen receptor hammerhead ribozyme target sequence SEQ ID NO:1679
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                                                                                                                                                                                                                                                                                                                                                                                                                                               Matulic-Adamic J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        28-OCT-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO9954459-A2
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                                                                                                                                                                                                                                                                                                                                                               to treat
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       subunit alpha-6, or integrin subunit beta-3
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Zwick M, Jar
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry
                                                                                                                                                                                                                                                                                                                                                             cancer.
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98US-00103636.
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to AAA26271
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is T, Woolf T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       2
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Pred. No. 1.8e
2; Mismatches
                                                                                                                                                                                                                                                                                                                                                                             and optionally cleave, target sequences,
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Haeberli
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NT, Tie-2,
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RESULT 2184
AAF05508
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RESULT 2185
AAF06148
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Matches 15
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              antisense invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 17
                                                                                                                                                                                     The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EAR3/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP) Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of
                                                                                                                                                                                                                                                                                                 Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAF05508 standard; DNA; 17 BP
                                                                                                                                              Sequence 17
                                                                                                                                                                             erythropoietin, granulocyte
                                                                                                                                                                                                                                                                  Claim 18; Page 118; 164pp; English.
                                                                                                                                                                                                                                                                                     useful for producing e.g. granulocyte interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                 WPI; 2000-647423/62.
                                                                                                                                                                                                                                                                                                                                                     Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                              12-APR-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     interferon alpha; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Ribozyme; erythropoietin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          16-FEB-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAF05508
                                                                                                                                                                                                                                                                                                                                                                          (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                     interferon alpha
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            596
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                                                                                                    l Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
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                                                                          TTTTGTATTTTTTTT 178
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                                                                                                                                                                                                                                                                                                                                                     Zwick M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ribozyme
                                                                                                                                               BP; 1 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP; 1
                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                               99US-0129390P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    substrate #2727.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
                                                                                                                                                                                                                                                                                                                                                      Pavco P,
                                                                                                                                               1 C;
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                                                                                                               1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                granulocyte colony stimulating factor;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0
                                                                                                      0;
                                                                                                                                               G; 13 T; 0 U;
                                                                                                                                                                              colony stimulating
                                                                                                      Score 14.4; D
Pred. No. 1.8e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                      Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          14 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0 Other;
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                                                                                                                          DB 1;
                                                                                                                                               0 Other;
                                                                                                                                                                              factor protein
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AAF06148

standard;

DNA; 17

ВP

12-APR-1999;

99US-0129390P

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Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EAR3/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP) Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17 BP; 2 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     19-OCT-2000
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Hammerhead ribozyme substrate
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      AAF06148;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        erythropoietin,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Claim 42; Page 123; 164pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2000-647423/62
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      12-APR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     11-APR-2000; 2000WO-US009721
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WO200061729-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              interferon alpha;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        16-FEB-2001
                                                                                                                   Homo sapiens.
                                                                                                                                                                                             Hammerhead ribozyme substrate #2948.
                                                                                                                                                                                                                             16-FEB-2001
                                                                                                                                                                                                                                                          AAF06151;
                                                                                                                                                                                                                                                                                          AAF06151 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          interferon alpha
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                            11-APR-2000; 2000WO-US009721.
                                                         19-OCT-2000
                                                                                        WO200061729-A2
                                                                                                                                                  interferon alpha;
                                                                                                                                                                Ribozyme; erythropoietin;
                                                                                                                                                                                                                                                                                                                                                                                                   427 TTTTTATTTTATTTTT 442
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                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
2; Conserve
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Zwick M,
                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                             (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          granulocyte
                                                                                                                                                   88
                                                                                                                                                                                                                                                                                          DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Pavco P,
                                                                                                                                                                                                                                                                                                                                                                                                                                                1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               0 C; 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              granulocyte colony stimulating
                                                                                                                                                                granulocyte colony stimulating factor;
                                                                                                                                                                                                                                                                                                                                                                        17
                                                                                                                                                                                                                                                                                                                                                                                                                                   13;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               G; 0 T; 13 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          colony stimulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              #2945
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                                                                                                                                                                                                                                                                                                                                                                                                                                                 .8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            factor protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Length 17;
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RESULT 2187
ABA91530
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EAR3/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement protein (CDP). Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of erythropoietin, granulocyte colony stimulating factor protein and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 17 BP; 2 A; 1 C; 1 G; 0 T; 13 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                          DNA-RNA-DNA oligonucleotide AGT02014 used to test RNase H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 42;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Enzymatic
                                              Probes for detecting target nucleotide sequence in sample, has sequence
that forms hairpin structure having a double-stranded segment and singl
                                                                                                                                                                                                                                          WO200206531-A2
                                                                                                                                                                                                                                                                                         misc_RNA
                                                                                                                                                                                                                                                                                                                                                   DNA-RNA hybrid; RNase H; nuclèic acid detection; ss
                                                                                                                                                                                                                                                                                                                                                                                                    23-APR-2002
                                                                                                                                                                                                                                                                                                                                                                                                                           ABA91530
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (RIBO-) RIBOZYME PHARM INC.
                                 stranded
                                                                                 WPI; 2002-171819/22.
                                                                                                                                                       14-JUL-2000; 2000US-00616761.
30-MAR-2001; 2001US-00823647.
                                                                                                                                                                                           12-JUL-2001; 2001WO-US022166
                                                                                                                                                                                                                  24-JAN-2002.
                                                                                                                                                                                                                                                                                                                                                                                                                                                  ABA91530 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 interferon alpha
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   interferon
                                                                                                                                (GENE-) APPLIED GENE TECHNOLOGIES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  2000-647423/62.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    429 TITATTTTATTTTTT 444
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                                 doop
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              UGUAUUUUAUUUUUUUU 16
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               and antisense nucleic acid inhibition of repressor genes, r producing e.g. granulocyte colony stimulating factor protein, n alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Zwick M,
                                 hairpin structur
oop collectively
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                 /*tag= a
/label= RNA
                                                                                                                                                                                                                                                                                                   Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Pavco
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                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP
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                                 forming
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score
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                                                                                                                                 INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       No.
                                 region
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  14.4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   B
                                 complementary
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Indels
                                 to target
                                                                                                                                                                                                                                                                                                                                                                          cleavage
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Example 4;

Page 49; 72pp; English

customer orders for custom-designed biochips in an automated process. The invention also includes an automated system and process for providing a fully automated process for the design, manufacture and analysis of data for biological array devices. The sequence represents a capture probe designed in the invention for the "sample ataxia" set of targets, as an

relates to a novel process for a manufacturer to obtain

The

Example 5; Page 21; 47pp; English.

desired target sequences f for an array and applying

Automated process for custom-designed biochip design,

sequences from customer, creating nd applying the motif to a surface

sequence suitable

comprises obtaining content motif

example of an array that may be designed

using the

method

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ABN83023/c
ID ABN83C
XX
AC ABN83C
XX
S
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Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present sequence is that of DNA-RNA-DNA hybrid oligonucleotide AGT02014. This is one of a set of oligonucleotides (see ABA91527-30) used to assess the minimum number of ribonucleotides in DNA-RNA chimeric oligonucleotides required for RNase H cleavage. Each oligonucleotide of the set had a different number of ribonucleotides, 1 in the present case. The oligonucleotides were mixed with target DNA oligonucleotide AGT02009 (see ABA91531) and incubated with target DNA oligonucleotide AGT02009 minutes. The results showed that 4 ribonucleotides were the minimum number for RNA cleavage. The invention provides probes for nucleic acid hybridisation. The probes form a halipin structure comprising a double-stranded stem and a single-stranded loop, and are capable of both intramolecular and intermolecular hybridisation. The double-stranded stem may comprise a methylphosphonate DNA-RNA hybrid that is resistant to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17 BP; 1 A; 0 C; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             RNASE H cleavage. When the probe hybridises with a target DNA, the RNA strand in the DNA:RNA duplex becomes sensitive to RNase H treatment and can be removed. Arrays and methods for nucleic acid hybridisation using
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Ataxia telangiectasia locus 56594896-WNeg-t capture probe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   16-AUG-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ABN83023;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ABN83023 standard;
                                                                                                                                                                                                                                                                                       18-APR-2000;
22-NOV-2000;
                                                                                                                                                                                                                                                                                                                                                            25-OCT-2001.
                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                           Ataxia telangiectasia; probe; biochip; array; capture; ss
                                                                                                                                                                                                        WPI; 2002-017664/02.
                                                                                                                                                                                                                                                                                                                                                                                      WO200180155-A2
                                                                                                                                                                                                                                  Inderson BP,
                                                                                                                                                                                                                                                               (COMB-)
                                                                                                                                                                                                                                                                                                                                 18-APR-2001; 2001WO-US012750
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               removed. Arrays and methods for obes are provided
                                                                                                                                                                                                                                                               COMBIMATRIX CORP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
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                                                                                                                                                                                                                                                                                         2000US-0198045P
2000US-0252880P
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                                                                                                                                                                                                                                  Quarles
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                                                                                                                                                                                                                                  PA,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               16
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                                                                                                                                                                                                                                    Ghazvini
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      G
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Pred.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0 Other;
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RESULT 2189
ADG14612
ID ADG1461
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CC The invention relates to a method for predicting an individual's charapeutic response to the administration of interferon-alpha-2b and CC ribavirin for the treatment of a pathological condition, especially CC hepatitis C virus (HCV) infection. The method involves determining which CC allelic form is present at positions -3575, -2763, -1082, -819 and -592 CC of the interleukin-10 (IL-10) regulatory region, and comparing these with CC the allelic forms at these positions which are associated with a known cutcome of interferon-alpha-2b and ribavirin administration. Presence of the single nucleotide polymorphisms -592A and -819T, the -592A/A or -CC 819T/T genotypes, the combination of -592A/-819T as a haplotype, or possession of the (108)TCATA haplotype (encompassing positions -3575, -2763, -1082, -CC 919 and -592) is associated with a sustained response to interferon-alpha CC or the (108)TCACC haplotype indicates that the presence of -592C and -819C, cresponsive to this therapy. The method optionally further comprises CC detection of the allele at position -318 of the cytotoxic T-lymphocyte antigen-4 (CTLA-4) promoter and the allele at position 49 of exon 1 of the CTLA-4 gene. The invention also encompasses kits and oligonucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              IL-10 regulatory region; single nucleotide polymorphism; SNP; haplotype genotype; cytotoxic "-lymphocyte antigen-4; CTLA-4 promoter; CTLA-4 exon 1; bacterial infection; meningococcal infection; rheumatoid arthritis; systemic lupus erythematosus; Sjogren's syndrome; inflammatory bowel disease; multiple sclerosis; human; PCR; primer; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                         Predicting a therapeutic response comprises comparing a first nucleic acid allele in an interleukin-10 (IL-10) regulatory region with a seconnucleic acid allele in the IL-10 regulatory region associated with a
                                                                                                                                                                                                                                                                                                                                                                        Claim 12; SEQ ID NO 3; 34pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 2002-707021/76.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         response; therapeutic outcome; interferon-alpha-2b; nepatitis C virus; HCV infection; interleukin-10;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              regulatory region PCR primer IL10-2763CR,
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Pred. No. 1.8e+03;
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RESULT 2190
ABT36747
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Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               primers for use in the methods of the invention. The method and primers are useful for identifying and analysing genetic polymorphisms in the IL 10 regulatory region and/or cytotoxic T-lymphocyte antigen-4 which can bused in predicting an individual's response to therapeutic intervention with interferon-alpha-2b and ribavirin for HCV infection, and for predicting the responsiveness of an individual to therapy for a pathological condition, or for predicting the outcome of therapeutic intervention in pathological conditions such as bacterial infection (e.g meningococcal infection), rheumatoid arthritis, systemic lupus erythematosus, Sjogren's syndrome, inflammatory bowel disease or multiple erythematosus, Sjogren's syndrome, inflammatory bowel disease or multiple erythematosus.
given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic containing the polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   erythematosus, Sjogren's symmum, .... the invention. sclerosis. The present sequence is related to the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; antisense; sense; tumour; cell degeneration; cancer; Alzheimer schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                                                                                                                                                                                                                                       New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Tumour suppression related human fukutin oligo SEQ ID No
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                                                                                                                                                                                                                    The invention relates to a novel isolated 17 mer nucleic acid sequence
                                                                                                                                                                                                                                                       Disclosure; Page 311; 720pp; French
                                                                                                                                                                                                                                                                                                                                                                                                    Telerman
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disease;
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RESULT 2191
ABT39415/c
ID ABT3941
The invention relates to a novel isolated 17 mer nucleic acid sequence, containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal clasment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (antil sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, polypeptides, vectors containing the nucleic acids, cells containing the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local S
Matches 15
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schizophrenia; ;
human fukutin;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure; Page 624; 720pp; French.
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nia; protein chip; gene therapy; tumour suppression;
tin; ds.
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No. 1.8e+03;
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disease;
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RESULT 2192
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                    cc given in the specification, a sequence containing at least 15 consecutive cnucleotides from the 17 mer sequence with, after optimal calignment, at least 80 % identity to the 17 mer sequence, a sequence that the hybridizes to them under highly stringent conditions, or the complement configuration of the invention are useful as probes and primers for detecting, cards of the invention are useful as probes and primers for detecting, conditions, quantifying and/or amplifying a mucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, colls containing the vector or antibodies directed against the polypeptides are useful for vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral cdiscophrenia. Analysis of the expression of the 17 mer nucleic acids in Schizophrenia. Analysis of the expression of the 17 mer nucleic acids in the containing is negative for discoperation of these
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Sequence 17 BP; 4 A; 5 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 255; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17-SEP-2001; 2001FR-00011978.
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human fukutin; ds.
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ABTSULT 2193
ABT38180
ID ABT3818
AC Cytoste
KW Cytoste
KW Cytoste
KW antiser
KW schizop
KW human f
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FP 17-SEP-
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FP 17
The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence with, after optimal cc hybridizes to them under highly stringent conditions, or the complement cc fany of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, cc identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for cc production of recombinant polypeptides. Any of the nucleic acids, colypeptides, vectors containing the mucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for cc preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell containing the acids and protein smples is useful for diagnosis and/or prognosis of these cc diseases. The polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of protein
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93.8%;
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CC given in the specification, a sequence with, after optimal CC nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that CC hybridizes to them under highly stringent conditions, or the complement CC of any of them, or the corresponding RNA. The novel isolated nucleic CC acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti) sense reagents, and for CC production of recombinant polypeptides. Any of the nucleic acids, the corresponding the nucleic acids, cells containing the corresponding to the corresponding to the corresponding to the corresponding to the polypeptides are useful for CC preparation of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell CC diseases that are characterised by development of the corresponding in the polypeptides and antibodies and/or prognosis of these and CC both the polypeptides can also be used to generate antibodies, and CC therapy. This polynucleotide sequence of the invention can be used in gene CC therapy. This polynucleotide sequence represents a tumour suppression
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human fukutin;
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Pred. No. 1.8e+03;
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one therapy; tumour
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ABT36344
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The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive CC nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that conditions, or the complement CC hybridizes to them under highly stringent conditions, or the complement CC acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, CC polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for CC preparation of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell cegeneration, specifically cancer but also Alzheimer's disease and CC diseases. The polypeptides can also be used to generate antibodies, and containing the polypeptide and antibodies are useful as components of these containing chips. The nucleic acid sequences of the invention can be used in gene characterised by development of tumours or cell containing the 
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human fukutin; ds.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               antisense; sense; tumour; cell
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           fukutin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        15; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             standard; DNA;
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Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
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Sequence 17

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                         Cg given in the specification, a sequence containing at least 15 consecutive curve nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence, a sequence that CC hybridizes to them under highly stringent conditions, or the complement CC acids of the invention are useful as probes and primers for detecting, acids of the invention are useful as probes and primers for detecting, CC identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for CC production of recombinant polypeptides. Any of the nucleic acids, polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for CC preparation of pharmaceuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell CC diseases that are characterised by development of tumours or cell CC diseases. The polypeptides can also be used to generate antibodies, and CC diseases. The polypeptides can also be used to generate antibodies, and CC diseases. The polypeptides can also be used to generate antibodies, and CC chips. The nucleic acid sequences of the invention can be used in gene CC therapy. This polynucleotide sequence represents a tumour suppression cC related human fukutin oligonucleotide of the invention
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                            The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (MOLE-) MOLECULAR ENGINES LAB
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Pred. No. 1.8e+03;
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Best Local Similarity

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1.8e+03;

DB 1;

Length 17;

Query Match Best Local S Matches 15

Similarity

1.5%;

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ABT38008
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                                                                                                                                                                       given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration. specifically canner but also aliebases and and deceneration.
                             degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. Analysis of the expression of the 17 mer nucleic acids in patient samples is useful for diagnosis and/or prognosis of these diseases. The polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of protein chips. The nucleic acid sequences of the invention can be used in gene therapy. This polynucleotide sequence represents a tumour suppression related human fukutin oligonucleotide of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
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disease;
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ATCATGGCTCACTGCA 17

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ABT35457
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Matches 15
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                                                                                                                 Sequence
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                                       Conservative
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Score 14.4; Pred. No. 1.8); Mismatches

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Length 17; Indels

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RESULT 2200
ABT36801/c
                                        CC given in the specification, a sequence containing at least 15 consecutive controlled in the specification, a sequence with, after optimal califorment, at least 80 % identity to the 17 mer sequence, a sequence that CC hybridizes to them under highly stringent conditions, or the complement CC of any of them, or the corresponding NNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, conditions of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of recombinant polypeptides. Any of the nucleic acids, cells containing the cettor or antibodies directed against the polypeptides are useful for corporation of pharmaceuticals for prevention and/or treatment of viral consenses that are characterised by development of tumours or cell diseases that are characterised by development of tumours or cell containing the subject samples is useful for diagnosis and/or prognosis of these confit tamples is useful for diagnosis and/or prognosis of these confit samples is useful for diagnosis and/or prognosis of these confits. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene confit acid sequences of the invention can be used in gene confit acid sequences of the invention can be used in gene confit acid sequences of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequences of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used in gene confit acid sequence of the invention can be used to gene 
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Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page 318; 720pp; French.
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  BP; 4 A; 2 C; 7 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tuijnder M;
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RESULT 2201
ABT36337/c
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                                                                                   Query Match
Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Disclosure; Page 263;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Telerman A,
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                                                                                                                                                                      Sequence 17 BP;
                                                                                                                                                                                                                  therapy. This
related human
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              transfected cells.
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                                         386
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  17
                                                                                   l Similarity
                                       CCCAAAGTGCTGGGAT 401
  CCCAAAGTGCTGAGAT 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Amson R,
                                                                                     Conservative
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                                                                                                                                                                                                               polynucleotide sequence represents a tume fukutin oligonucleotide of the invention
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                                                                                                                                                                      Α;
                                                                                                     1.5%;
                                                                                                                                                                      4 C; 5 G; 5 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  720pp; French.
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                                                                                   0
                                                                                                          Score 14.4;
Pred. No. 1
                                                                                   Mismatches
                                                                                                          1.8e+03;
                                                                                                                                                                          0 Other;
                                                                                                                            DB 1; Length 17;
                                                                                   1;
                                                                                       Indels
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                                                                                     0
                                                                                       Gaps
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RESULT 2202

RESULT 2203 ABT34597 ID ABT3459

ABT34597 standard; DNA; 17

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Matches

532 N

ATCCTCCTGCCTCAGC 547

Conservative

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Gaps

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Creation relates to a novel isolated 17 mer nucleic acid sequence, containing at least 15 consecutive containing to the 17 mer sequence a sequence that containing containing the novel isolated nucleic containing of the invention are useful as probes and primers for detecting, confidentifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of recombinant polypeptides. Any of the nucleic acids, containing the vector or antibodies directed against the polypeptides are useful for concervation of pharmaceuticals for prevention and/or treatment of viral conseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and containing the special sequences of the 17 mer nucleic acids in containing the polypeptides can also be used to generate antibodies, and both the polypeptide and antibodies are useful as components of these characterises and also be used to generate antibodies, and containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein contains.

The nucleic acid sequences of the invention can be used in gene containing the containing the used in gene containing the containing the used in gene containing the con
                      Query Match
Best Local
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schizophrenia; |
human fukutin;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                             Sequence 17
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                           Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Amson R,
                                                                                                BP; 2 A; 7 C; 3 G;
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                      1.5%;
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Score 14.4; DB 1; Length 17; Pred. No. 1.8e+03; 0; Mismatches 1; Indels
                                                                                                5 T; 0 U; 0 Other;
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                                      ABT36198
                                                   RESULT 2204
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                                                                                                                                             Matches
                                                                                                                                                         Query Match
Best Local S
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               with tumors and cell d
and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
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ABT36198;
                          ABT36198 standard; DNA; 17
                                                                                                                                                                                                 Sequence 17 BP; 2 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 61; 720pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2003-313353/30.
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                                                                                                                                          Local Similarity
nes 15; Conserv
                                                                                                                  532
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                                                                                           ATCCTCCCGCCTCAGC 17
                                                                                                                  ATCCTCCTGCCTCAGC 547
                                                                                                                                           1.5%;
ilarity 93.8%;
Conservative
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                                                                                                                                                                                                 9 C; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Tuijnder M;
                                                                                                                                             0;
                                                                                                                                                                                                 G; 3 T; 0 U; 0 Other;
                                                                                                                                                        Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                             Mismatches
                                                                                                                                                                      DB 1;
                                                                                                                                                                      Length 17;
                                                                                                                                              Indels
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                                                                                                                                             Gaps
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WO2003025175-A2
                                                                                Homo sapiens
                                                                                                                                                            schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                                                                                                                                                                                            Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                  Tumour suppression related human fukutin oligo SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                                                  12-JUN-2003 (first entry)
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27-MAR-2003

17-SEP-2002; 2002WO-IB004208

17-SEP-2001; 2001FR-00011978.

(MOLE-) MOLECULAR ENGINES LAB

Telerman A, Amson R, Tuijnder M;

New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.

Disclosure; Page 247; 720pp; French.

The invention relates to a novel isolated 17 mer nucleic acid sequence, containing at least 15 consecutive containing at least 15 containing at conditions, or the complement containing at least 18 containing at least 18 containing at least 18 containing the component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of pharmaceuticals for prevention and/or treatment of viral containing the vector or antibodies directed against the polypeptides are useful for corporation of pharmaceuticals for prevention and/or treatment of viral conservation, specifically cancer but also Alzheimer's disease and containing the expression of the 17 mer nucleic acids in containing the expression of the 17 mer nucleic acids in containing the expression of the 18 consons and or these containing the expression and or proposed the polypeptides can also be used to generate antibodies, and containing the containing the containing the expression of the seed in gene chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene chips.

Sequence 17 BP; 5 A; 7 C; 2 G; 3 T; 0 U; 0 Other;

ABT36270 ID ABT3 XX AC ABT: XX DT 12-, S 밁 RESULT 2205 Matches Query Match Best Local Similarity ABT36270 standard; DNA; 17 BP 480 GTGCAGTGGTGATC 495 15; 16 GTGCAGTGGTATGATC 1 Conservative 93.8%; 0; Pred. No. Score 14.4; Mismatches 1.8e+03 DB 1; Length 17; 0 Gaps

0

ABT36270;

12-JUN-2003 (first entry)

Tumour suppression related human fukutin oligo SEQ ID

No 1907

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The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive cnucleotides from the 17 mer sequence, a sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence that cc hybridizes to them under highly stringent conditions, or the complement co f any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, cc identifying, quantifying and/or amplifying a nucleic acid, e.g. as one cc component of a gene chip, in vitro as (anti)sense reagents, and for cc production of recombinant polypeptides. Any of the nucleic acids, cc polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for cc preparation of pharmaceuticals for prevention and/or treatment of viral cd diseases that are characterised by development of tumours or cell diseases that are characterised by development of tumours or cell contains samples is useful for diagnosis and/or prognosis of these cc diseases. The polypeptides can also be used to generate antibodies, and contains the polypeptide and antibodies are useful as components of these characterises. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene characterise and nucleic acid sequences of the invention can be used in gene characterise and nucleic acid sequences of the invention can be used in gene components of these can be used in gene components of these can be used in gene components of these can be used in gene components of the sequences of the invention can be used in gene characterise of the invention can be used in gene components of the invention can be used in gene components of the invention can be used in gene components of the invention can be used in gene components of the invention can be used in gene components of the invention 
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  BXAXAXB
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Disclosure; Page 256;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     with tumors and cell of and transfected cells
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             17-SEP-2001; 2001FR-00011978
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Tumour suppression related human fukutin oligo SEQ ID No 203
                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17 BP; 4
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                                                                                                                                ABT34566 standard;
                                                                                                                                                                                                                                                                                   381 AGCCTCCCAAAGTGCT 396
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                                                                                                                                                                                                                                                                                                                              | Similarity
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                                                                                                                                                                                                                                                                                                                                 Conservative
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                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                      A; 6 C; 3
                                                                                                                                  DNA;
                                                                                                                                                                                                                                                                                                                                                 1.5%;
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                                                                                                                                                                                                                                                                                                                              Score 14.4; D
Pred. No. 1.8e
0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                     1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                      Other;
                                                                                                                                                                                                                                                                                                                                                                        Length 17;
                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                 <u>,,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              associated antibodies
                                                                                                                                                                                                                                                                                                                                   Gaps
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The invention relates to a novel isolated 17 mer nucleic acid sequence, completed in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence with, after optimal calignment, at least 80 % identity to the 17 mer sequence that thybridizes to them under highly stringent conditions, or the complement complete for the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, component of a gene chip, in vitro as (anti)sense reagents, and for polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell diseases that are characterised by development of tumours or cell contains samples is useful for diagnosis and/or prognosis of these chizophrenia. Analysis of the expression of the 17 mer nucleic acids in patient samples is useful for diagnosis and/or prognosis of these chips. The nucleic acid sequences of the invention can be used in gene therapy. This polymented sequence of the invention can be used in gene characteristic sequences of the invention can be used in gene contained the invention can be used in gene contained the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               17-SEP-2001; 2001FR-00011978.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page 57; 720pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Telerman A,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Tuijnder M;
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's disease;
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Matches
                                                            Query Match
                                                                                  Sequence 17
                                                   Local
                    532 ATCCTCCTGCCTCAGC 547
N
                                                    Similarity
                                                                                  BP; 2 A; 9 C; 2 G; 4 T; 0 U;
                                                   1.5%;
                                        Score 14.4; DB 1
Pred. No. 1.8e+03
0; Mismatches
                                                                                    0 Other;
                                                              DB 1; Length 17;
                                           Indels
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(first

entry

ABT37351 standard; DNA; 17

ВP

ABT37351;

Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip;

Tumour suppression related human fukutin oligo SEQ ID No 2988

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Best Local S
Matches .15
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schizophrenia; protein chip; gene therapy; tumour suppression;
human fukutin; ds.
Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disschizophrenia; protein chip; gene therapy; tumour suppression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                           Tumour suppression related human fukutin oligo SEQ ID No
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                                                                                                                                           12-JUN-2003
                                                                                                                                                                                                                                    ABT39059 standard;
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                                                                                                                                                                                                                                    DNA; 17
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                                                                                                                                           entry)
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Pred. No. 1.
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                            disease;
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The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal calignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement conditions of the invention are useful as probes and primers for detecting, cards of the invention are useful as probes and primers for detecting, component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acid, e.g. as one component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, collagonation of pharmaceuticals for prevention and/or treatment of viral components of pharmaceuticals for prevention and/or treatment of viral containing the containing the containing the containing the prevention, specifically cancer but also Alzheimer's disease and schizophrenia. Analysis of the expression of the 17 mer nucleic acids in patient samples is useful for diagnosis and/or prognosis of these contains. The pulpeptides can also be used to generate antibodies, and contains. The nucleic acid sequences of the invention can be used in gene contains. The polypeptides can also be used to generate antibodies, and the polypeptides and antibodies are useful as components of protein contains. The polypeptide sequence represents a tumour suppression contains and tumour suppression of the contains of protein contains.
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                                             Sequence 17 BP; 2 A; 5 C; 5 G; 5 T; 0 U; 0 Other;
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                                                                                          therapy. This polynucleotide sequence represents a tumurelated human fukutin oligonucleotide of the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Tuijnder M;
DB 1;
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S Matches Query Match Best Local S 837 GATCTGCCTGCCTCGG 852 15; Similarity Conservative 1.5%; 0 Pred. Score 14.4; Mismatches No. 1.8e+03; Length 17; <u>,</u> Gaps

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RESULT 2209 ACA06514 ACA06514 standard; ACA06514; (first entry) RNA; 17 ВP

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sub-unit modulating inozyme substrate #333.

03-JUN-2003

Enzymatic nucleic acid; nuclear factor kappa B; NFKB; inozyme; zinzyme; G-cleaver; amberzyme; cancer; REL-A activity; breast cancer; human; lung cancer; prostate cancer; colorectal cancer; brain cancer; oesophageal cancer; stomach cancer; bladder cancer; pancreatic cancer; cervical cancer; head and neck cancer;

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CC regulates expression of a sequence encoding a subunit of nuclear factor (kappa B (NFKB), where (I) is an inozyme, zinzyme, G-cleaver or amberzyme (C confeiguration. The enzymatic nucleic acid molecule is adapted to treat (C cancer and is useful for down-regulating REL-A activity in a cell, for C treating a patient having a condition associated with the level of REL-A. (C (I) is useful for cleaving RNA comprising a sequence of REL-A gene, in C (I) is useful for cation, especially Mg^2+. The enzymatic and C the presence of a divalent cation, especially Mg^2+. The enzymatic and C prostate, colorectal, brain, oesophageal, stomach, bladder, pancreatic, C prostate, colorectal, brain, oesophageal, stomach, bladder, pancreatic, C cervical, head and neck, ovarian cancer, melanoma, lymphoma, glioma or C chemotherapy including paclitaxel, docetexel, cisplatin, methotrexate, C cyclophosphamide, doxorubin, fluorouracil carboplatin, edatrexate, C cyclophosphamide, doxorubin, fluorouracil carboplatin, edatrexate, cardot molecules are also useful for treating inflammatory disease such as a content of the content
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18-MAY-1994;
15-AUG-1994;
23-DEC-1996;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel enzymatic nucleic acid molecules which down regulates expression a sequence encoding a subunit of nuclear factor kappa B useful for treating cancer, inflammatory disorders and autoimmune diseases.
                                                                                                                       acid molecules are also useful for treating inflammatory disease such as rheumatoid arthritis, restenosis, asthma, Crohn's disease, diabetes, obesity, autoimmune disease, lugus, multiple sclerosis, transplant/graft rejection, gene therapy applications, ischaemia/reperfusion injury (central nervous system (CNS) and myocardial), glomerulonephritis, sepsis, allergic airway inflammation, inflammatory bowel disease or infection. This sequence represents the substrate of a novel enzymatic mucleic acid molecular.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 3; Page 32; 72pp; English.
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Sequence
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MCSWIGGEN J.
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94US-00245466.
94US-00291932.
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18-MAY-1994;
15-AUG-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 gemcitabine; radiation therapy; inflammatory disease; asthma; diabetes; rheumatoid arthritis; restenosis; Crohn's disease; obesity; ischaemia; gene therapy; autoimmune disease; lupus; multiple sclerosis; sepsis; transplant/graft rejection; reperfusion injury; glomerulonephritis; allergic airway inflammation; inflammatory bowel disease; infection; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        lymphoma; glioma; multidrug resistant cancer; REL-A-specific inhibitor; chemotherapy; paclitaxel; docetaxel; cisplatin; methotrexate; cyclophosphamide; doxorubin; fluorogracil carboplatin; edatrexate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                lung cancer; prostate cancer; colorectal cancer; brain cancer; oesophageal cancer; stomach cancer; bladder cancer; pancreatic cancer; cervical cancer; head and neck cancer; ovarian cancer; melanoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  G-cleaver; amberzyme; cancer; REL-A activity; breast cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Enzymatic nucleic acid; nuclear factor kappa B; NFKB; inozyme; zinzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            NFKB sub-unit modulating inozyme substrate #334
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ACA06515;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Stinchcomb DT,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (STIN/)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   23-DEC-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ) STINCHCOMB D
) MCSWIGGEN J.
) DRAPER K G.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (first
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94US-00291932.
96US-00777916.
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human;

Novel enzymatic nucleic acid molecules which down regulates expression a sequence encoding a subunit of nuclear factor kappa B useful for treating cancer, inflammatory disorders and autoimmune diseases.

WPI; 2003-340953/32.

Claim 3; Page 32; 72pp; English.

country utation. The enayments invited motivation is enabled to cancer and is useful for down-regulating REL-A activity in a cell, for classing a patient having a condition associated with the level of REL-A. (I) is useful for cleaving RNA comprising a sequence of REL-A gene, in the presence of a divalent cation, especially Mg^2^+. The enzymatic and contisense nucleic acid molecules are useful for treating breast, lung, prostate, colorectal, brain, oesophageal, stomach, bladder, pancreatic, corvical, head and neck, ovarian cancer, melanoma, lymphoma, glioma or multidrug resistant cancer. The method involves use of other drug charagies such as monoclonal antibodies, REL-A-specific inhibitors or concentration including paclitaxel, docetaxel, cisplatin, methotrexate, cyclophosphamide, doxorubin, fluorouracil carboplatin, edatrexate, cyclophamide, doxorubin, fluorouracil carboplatin, edatrexate, cyclophamide, doxorubin, fluorouracil carboplatin, edatrexate, cyclop The invention describes an enzymatic nucleic acid molecule (I) which down regulates expression of a sequence encoding a subunit of nuclear factor kappa B (NFKB), where (I) is an inozyme, zinzyme, G-cleaver or amberzyme kappa B (NFKB), where (1) is an inozyme, zinzyme, G-cleaver or amberzyn configuration. The enzymatic nucleic acid molecule is adapted to treat down

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Best Loc Matches

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75.0%; 1.5%;

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TCCTCCCCCAGCCTCC UCCUGCCCCAGGCUCC

17 726 Query Match

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               Query Match
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Best Local
                                                                                                                                               proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 7p21.3-22.2, MDZ7 is encoded at chromosome fighl.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17 BP; 2 A; 9 C; 3 G; 0 T; 3 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         nucleic acid molecule
                                                                                              useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                      New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7g22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human MDZ7 scanning oligonucleotide SEQ ID 5305
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                                                                                                                                                                                                                                                                                                                                         The present invention relates to novel human zinc finger-containing
                                                                                                                                                                                                                                                                                                                                                                         Example 8; SEQ ID NO 5305; 103pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2003-423107/40.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 developmental disorder; ss.
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               Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           711 TCCTGCCCCAGCCTCC 726
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                                                                4 A;
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75.0%;
               93.8%;
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               Score 14.4; DB 1; Length 17; Pred. No. 1.8e+03;
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Pred. No. 1.
                                                                2 T; 0 U;
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                                                                  0 Other;
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RESULT 2212
ADB04448
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Best Local :
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                                                                                                                                                                                                                          proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 15q26.1. The MDZ3 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 15p11.2; chromosome 15q26.1; cancer; developmental disorder; ss.
                                                                                                                                                                        useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New zinc finger-containing proteins and nucleic acids, useful manufacturing a medicament for treating or preventing a disorcassociated with decreased or increased expression or activity MDZ4, MDZ7 or MDZ12, e.g. cancer.
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                                                                                                                                      Sequence 17 BP; 4 A; 1 C; 8 G; 4 T; 0 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                                                                                              The present invention relates to novel human zinc finger-containing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Example 8; SEQ ID NO 5434; 103pp; English.
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                                   779 TTTAGTAGAGATGGGG 794
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                                                                                      Similarity
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                                                                                     Score 14.4; DB 1
Pred. No. 1.8e+03
                                                                      Mismatches
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ADB04436

ADB04436 standard; DNA; 17

RESULT 2213

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SECTION IN THE SECTION IN 
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ABZ60588
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer; developmental disorder; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      02-AUG-2001; 2001US-00922181
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 8; SEQ ID NO 5422; 103pp; English.
Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras;
                                                   Human K-Ras DNAzyme substrate #700.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence 17 BP; 4 A; 0 C; 2 G; 11 T; 0 U; 0 Other;
                                                                                                            21-MAR-2003
                                                                                                                                                               ABZ60588;
                                                                                                                                                                                                                  ABZ60588 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
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                                                                                                                                                                                                                                                                                                                                                        TATTTTGTATTTTAG 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
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                                                                                                            (first entry)
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Pred. No. 1.8e+03;
0; Mismatches 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DB 1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                               0,
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enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
anti-rheumatic; cancer; AIDS; ss.
                                                            Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
                                                                                                                                                                                                                                                                                                                                                                           29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    05-DEC-2002.
Claim 58; Page 98; 185pp; English.
                                                                                                                                                                                               WPI; 2003-140484/13
                                                                                                                                                                                                                                                     Mcswiggen J;
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                                                                                                                                                                                                                                                                                                                           PHARM INC.
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acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS: The sequences shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-luman immunodeficiency virus (HIV) or a component of HIV. The nucleic ribozymes of the The invention relates to a novel short interfering RNA (siRNA) nucleic invention N-Ras

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Sequence 17 BP; 4 A; 3 C; 6 G; 0 T; 4 U;
       0 Other;
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Query Match
Best Local
                 Matches
869 GATTACAGGCGTGAGC 884
                l Similarity
12; Conservat
                 Conservative
                          1.5%;
75.0%;
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                         Score 14.4; DB 1
Pred. No. 1.8e+03
                                   DB 1;
                   Indels
                   0;
                   Gaps
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ABZ60580 standard; RNA; 17
                                                            ш
                                                            GAUUACAGGCGUGUGC 16
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Human K-Ras DNAzyme substrate
                              21-MAR-2003
                              (first entry)
 #692
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Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; antianti-rheumatic; cancer; AIDS; ss.

Homo sapiens.

WO200297114-A2

05-DEC-2002.

29-MAY-2002; 2002WO-US016840

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RESULT 2216
ABZ60579
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59389 - ABZ6216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human riborates of the inventor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
                                                                                                                    29-MAY-2001; 2001US-0294140P
06-JUN-2001; 2001US-0296249P
10-SEP-2001; 2001US-0318471P
                                                                                                                                                                                                                                                                                                 Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding
Novel short interfering
                                                                                                                                                                                                                                                                                                                                                                                            21-MAR-2003
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                                                                                                                                                                              29-MAY-2002; 2002WO-US016840
                                                                                                                                                                                                                                         WO200297114-A2
                                                                                                                                                                                                                                                                       Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                              Human K-Ras DNAzyme substrate #691
                                                                                                                                                                                                                                                                                                                                                                                                                                                     ABZ60579 standard; RNA; 17 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mcswiggen
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                                                                                          (RIBO-)
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                               2003-140484/13.
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                                                                                        RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                UCAAGCGAUUCUCGUG 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 3 A; 4 C; 4 G; 0 T; 6 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
 RNA and enzymatic nucleic acid useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        5.
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       deficiency virus sequences.
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treating cancer, modulates the expression of a nucleic acid encoding {\tt HER2}, {\tt K-Ras}, {\tt H-Ras}, {\tt N-Ras}, and human deficiency virus sequences.
                                                                                                             English
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The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in AB259899 - AB26216, AB264544 - AB265531, AB266520 - AB266524, Sequence 17 BP; 4 A; 4 C; 4 G; 0 T; 5 U; 0 Other; ribozymes of the invention ABZ66530 - ABZ66585 represent substrate/target sequences for the human

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Matches
                                          Query Match
Best Local Similarity
                  997
                                   11;
N
GGUUCAAGCGAUUCUC 17
                 GGCTCAAGCGATTCTC 1012
                                    Conservative
                                          1.5%;
                                           Score 14.4;
Pred. No. 1
                                    Mismatches
                                            .8e+03;
                                                     DB 1;
                                    ::
                                                    Length
                                    Indels
                                   0,
                                    Gaps
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RESULT 2217
ABZ60570
ID ABZ6057
XX
29-MAY-2001; 2001US-0294140P.
06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
                                                                                                                                                                                                                                      Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                                                                                                                                                                                     05-DEC-2002.
                                                                                                                                                                                                                                                              Human K-Ras DNAzyme
                                                                                                                                                                                                                                                                             21-MAR-2003
                                                                                                                                                                                                                                                                                                         ABZ60570 standard;
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                                                                                                                                                                                                    WO200297114-A2
                                                                                                                                                                                                                  Homo sapiens.
                                                                                                                                                                                                                                anti-rheumatic; cancer; AIDS; ss.
                                                                                                                                                                                                                                                                                           ABZ60570;
                                                                                                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                         RNA; 17
                                                                                                                                                                                                                                                               substrate #682.
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The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule. That modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ra human immunodeficiency virus (HIV) or a component of HIV. The nucleic

e invention has cytostatic, anti-HIV, anti-HIV

anti-HIV, and anti-

N-Ras,

for reducing

acid molecule of the

Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.

Claim

Page

98;

185pp;

English.

Mcswiggen

2003-140484/13.

(RIBO-) RIBOZYME

PHARM INC

HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ59889 - ABZ62216, ABZ64544 - ABZ65520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human ribozymes of the invention

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ABZ60600
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Best Local :
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06-JUN-2001;
10-SEP-2001;
                                                              The invention relates to a novel short interfering RNA (siRNA) nucleic acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, and anti-numan immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ56530 - ABZ65531, ABZ65531, ABZ66524, ABZ65530 - ABZ65536 represent substrate/target sequences for the human in the colorectal acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ66530 - ABZ66524, ABZ65531, ABZ66530 - ABZ66524, ABZ66530 - ABZ66538 represent substrate/target sequences for the human in the color of the color of the human in the col
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV; anti-rheumatic; cancer; AIDS; ss.
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                                                                                                                                                                                                                                                                                                                                                                                              Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human K-Ras DNAzyme substrate #712
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                                                                                                                                                                                                                                                                                                                                                   Claim
  Sequence
                                                ribozymes of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (RIBO-) RIBOZYME PHARM INC
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                                                                                                                                                                                                                                                                                                                                                   58; Page 98; 185pp; English.
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    17
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    B₽;
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2001US-0296249P.
2001US-0318471P.
  3 A;
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  4 C; 6 G; 0 T; 4 U;
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Pred. No. 1.8e+03
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       0 Other;
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Query Match Best Local Similarity

1.5%; 75.0%;

Score 14.4; Pred. No. 1

4; DB 1; 1.8e+03;

Length

17;

RESULT 2220 ACC66396

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ACC66396 standard; DNA; 17

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RESULT 2219
ABZ60607
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Matches
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                                                                                                                                                                                                                                                       acid molecule or an enzymatic nucleic acid molecule, that modulates expression of a nucleic acid molecule encoding HER2, K-Ras, H-Ras, N-Ras, human immunodeficiency virus (HIV) or a component of HIV. The nucleic acid molecule of the invention has cytostatic, anti-HIV, and anti-rheumatic activity. The nucleic acid molecules are useful for reducing HER2, K-Ras, H-Ras, and HIV activity in a cell. The nucleic acids are also useful for treating breast, ovarian, colorectal, lung, prostate, bladder, or pancreatic cancer, and HIV infection, and AIDS. The sequences shown in ABZ5989 - ABZ62216, ABZ64544 - ABZ65531, ABZ66520 - ABZ66524, ABZ66530 - ABZ66585 represent substrate/target sequences for the human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human; ribozyme; short interfering RNA; siRNA; HER2; K-Ras; enzymatic nucleic acid; H-Ras; N-Ras; HIV; cytostatic; anti-HIV;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 29-MAY-2001; 2001US-0294140P.
06-JUN-2001; 2001US-0296249P.
10-SEP-2001; 2001US-0318471P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Novel short interfering RNA and enzymatic nucleic acid useful for treating cancer, modulates the expression of a nucleic acid encoding HER2, K-Ras, H-Ras, N-Ras, and human deficiency virus sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 anti-rheumatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human K-Ras DNAzyme substrate #719
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                                                                                                                                                                                     Sequence 17 BP; 5 A; 6 C; 2 G; 0 T; 4 U;
                                                                                                                                                                                                                                   ribozymes of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention relates to a novel short interfering RNA (siRNA) nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 58; Page 98; 185pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WPI; 2003-140484/13.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 29-MAY-2002; 2002WO-US016840
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                                                                                                                 Local
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                                             1124 AACTCCTGACCTCAGG 1139
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                                                                                                                    Similarity
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AACUCCUGACCUCAAG
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                                                                                          Conservative
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                                                                                                                 Score 14.4; DB 1;
Pred. No. 1.8e+03;
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                                                                                               Mismatches
                                                                                                                                                                                          0 Other;
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                                                                                                                                          Length 17;
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RESULT 2221
ACC68207/c
ID ACC6820
XX
AC ACC6820
XY
O1-JUL-
XX
DE Murine
XX
Cytosta
KW tumour
KW viral c
KW viral c
KW schizof
XX
OS Mus mus
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ON MUS MUS
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Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          tumour suppression;
viral disease; tumou
schizophrenia; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mus musculus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; murine; tumour suppression; tumour reversion; apoptosis; virus resistance; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
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     WO2003025176-A2.
                                                                                Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; murine; tumour suppression; tumour reversion; apoptosis; virus resistance; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17 BP; 1 A; 6 C; 4 G; 6 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-333167/31.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Murine oligonucleotide associated with tumour supression,
                                    Mus musculus
                                                                                                                                                 Murine oligonucleotide associated with tumour supression,
                                                                                                                                                                                01-JUL-2003
                                                                                                                                                                                                                                                ACC68207 standard; DNA; 17
                                                                  schizophrenia;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (MOLE-) MOLECULAR ENGINES LAB.
                                                                                                                                                                                                                                                                                                                                                            837 GATCTGCCTGCCTCGG 852
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                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
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Pred. No. 1.
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RESULT 2222
ADB44023/c
ID ADB44023
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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in viro as (anti) sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.
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                                                                                                                                                                                                                         diagnosis.
                                                                                                                                                                                                                                       primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                        Tumour suppression/reversion associated nucleotide
                                                                                                                                                                                                                                                                                                                                                                                      ADB44023 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence
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                                                                                                                                                                                                                                                                 cytostatic;
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04-DEC-2003
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                                   Telerman A, Amson R,
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            2003-441574/41
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                                                               MOLECULAR ENGINES LAB
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                                                                                                                                                                                                                                                                antiviral; neuroprotective; nootropic; neuroleptic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           BP; 6 A; 6 C; 3 G; 2 T; 0
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(first entry)
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93.8%;
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                                     Tuijnder M;
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Pred. No. 1.8e+
0; Mismatches
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RESULT 2223
ADB40272/c
ID ADB4027
XX ADB4027
XX ADB4027
XX IB-DEC-
DT 18-DEC-
DT 04-DEC-
XX Cytosta
XX Cytosta
KW Cytosta
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KW Cytosta
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KW Cytosta
XX Cytosta
XX INFO
DE 11-MAY-
XX HOMO Sa
XX HOMO Sa
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DF 17-SEP-
XX (MOLE-)
XX DR WPI; 20
XX DR WPI; 20
XX New nuc
PT useful
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Best Local (
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useful e.g. 1
polypeptide a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia). Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides, or the complement or corresponding RNA, of the nucleotides are used as probes or primers for detecting identifying, quantifying and/or amplifying nucleic acids, as in vitro identifying and or amplifying incleic acids.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17 BP; 4 A;
New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                            15-MAY-2003
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                                                                                                                                                                                                                                                                                                                                                                                                               primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                         cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Tumour suppression/reversion associated nucleotide #595
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04-DEC-2003
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                                                                                                                                                                                               17-SEP-2001; 2001FR-00011981
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                                                                                WPI; 2003-441574/41.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                       antiviral; neuroprotective; nootropic; neuroleptic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        and antibodies.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (revised)
(first entry)
                                                                                                                   Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   relates to the isolation of 6327 nucleotide sequences at least 15 consecutive nucleotides of these nucleotid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 7 C; 4 G; 2 T; 0 U; 0 Other;
                                                                                                                     Tuijnder M;
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Pred. No. 1.8e+03
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RESULT 2224
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Best Local S
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     or cell degeneration (e.g. Alzheimer's disease or schizophrenia). Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides car also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and
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                                       usetul e.g.
polypeptide
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                                            New nucleic acid encoding human prostate membrane-specific ant useful e.g. for treatment of tumors and viral infection, also polypeptide and antibodies.
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virus resistance; transgenic animals; Alzheimer's disease; schi
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Disclosure; Page 464; 771pp; French

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                                                                                                                                                                                                                               New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
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virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
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The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, sequence having at least 80% identity, after optimal alignment, with t

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The invention relates to the isolation of 6327 nucleotide sequences, if ragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting

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Disclosure; Page 70; 771pp; French.

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RESULT 2226
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                                                                                                                                           New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
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                                                                                                           Page 375; 771pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         disease; schizophrenia;
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RESULT 2227
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The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detectin identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; 88; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 17
                                                                                                                                                                                                                                                                                                                                                       New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
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                                                                                                                                                                                                                                                                                                         Disclosure; Page 399; 771pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-441574/41.
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(first entry)
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Pred. No. 1.8e+03
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The invention relates to the isolation of 6327 nucleotide sequences, a fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and experimental models. The nucleotides (also vectors containing them and

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vectors containing them and polypeptides and antibodies

Disclosure; Page 411;

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                                                                                                                                                                                                                                                                                                                                                                                          useful e.g.
polypeptide
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virus resistance;
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RESULT 2229
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                     the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours
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virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
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Pred. No. 1
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                   The invention relates to the isolation of 6327 nucleotide sequences, or fragments of at least 15 consecutive nucleotides of these nucleotides, a gequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides. The nucleotides are used as probes or primers for detecting, cidentifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as containing the vectors), the encoded polypeptides and antibodies (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies ((Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

CC analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides can be used for diagnosis
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Matches 15; Conserv
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polypeptide
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primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      suppression/reversion associated nucleotide #1624.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           GTGCAGTGGCGCGATC 1
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Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          French
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                                                       The invention relates to the isolation of 6327 nucleotide sequences, and fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the currentides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, cidentifying, quantifying and/or amplifying nucleic acids, as in vitro corresponding RNA, of the current of the complement, or corresponding RNA, of the current of the complement, or corresponding RNA, of the current of t
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Best Local :
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04-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure; Page 94; 771pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI;
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virus resistance;
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probe; tumour suppression; tumour reversion; apoptosis;
esistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Similarity
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                                             of the nucleotides.
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Query Match

Sequence

17

BP; 4

A; 5 C; 4

G; 4 T; 0 U; 0 Other

1.5%;

Score 14.4;

DB 1;

Length 17;

Best Local Similarity

93.8%; Pred. No. 1.8e+03;

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ADB44035
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                                         The invention relates to the isolation of 6327 nucleotide sequences, and consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding NNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Chanlysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, the expression of the nucleotides associated with abnormal concentration of the nucleotides associated with abnormal
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17-SEP-2001; 2001FR-00011981.
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BP;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                          and antibodies.
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                                   the nucleotides
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7 C; 3
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Query Match Best Local S Matches 15

Similarity

1.5%;

Score 14.4; Pred. No. 1.

.8e+03; DB 1;

Length 17

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RESULT 2234
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Query Match
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Matches 15
                                                                                                                                                                                             suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour
                                                                                                                                       Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related polypeptide and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Tumour suppression/reversion associated nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADB45739 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure; Page 740; 771pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-441574/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      17-SEP-2001; 2001FR-00011981
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WO2003040369-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         cytostatic; antiviral; neuroprotective; nootropic; neuroleptic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             18-DEC-2003 (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 15-MAY-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            532
                                       Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ATCCTCCTGCCTCAGC
1.5%;
nilarity 93.8%;
Conservative
                                                                                                                                       BP; 5 A; 7 C; 3 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17
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   0,
                                       Score 14.4;
Pred. No. 1.
                                                                                                                                       2 T;
       Mismatches
                                                                                                                                       0 U; 0 Other;
                                       .8e+03;
                                                                       DB 1; Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                #6062
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       <u>,</u>
       Gaps
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ADB45601/c
ID ADB456
XX
AC ADB456
AC ADB46
AC ADB466
AC ADB466
AC ADB466
AC ADB466
AC ADB466
AC ADB466
AC 
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                                                      8
                                                                                                                                                                                                                                                                                                                                                                     The invention relates to the isolation of 6327 nucleotide sequences, cc fragments of at least 15 consecutive nucleotides of these nucleotides, a cc sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringent conditions with the cnucleotides, or the complement, or corresponding RNA, of the nucleotides are used as probes or primers for detecting, cc identifying and/or amplifying nucleic acids, as in vitro csense and antisense sequences, of nucleotides involved in tumour csense and antisense sequences, of nucleotides involved in tumour csense and antisense sequences, of nucleotides involved in tumour csense and antisense sequences, of nucleotides involved in tumour csense in polypeptides, and to prepare transgenic animals, as ccells containing the vectors), the encoded polypeptides and antibodies (cells containing the vectors), the encoded polypeptides and antibodies containing the vectors), the encoded polypeptides and antibodies containing the vectors of iseases characterized by development of tumours corell degeneration (e.g. Alzheimer's disease or schizophrenia).

Cc Analysis of the expression of the nucleotides can be used for diagnosis and optimized the screen for their specific interactive molecules can be used to screen for their specific interactive molecules.
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                                                                                                                          Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New nucleic useful e.g. polypeptide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADB45601;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2003-441574/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  17-SEP-2001; 2001FR-00011981.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17-SEP-2002; 2002WO-IB004219
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    15-MAY-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WO2003040369-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Tumour suppression/reversion associated nucleotide #5924.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   18-DEC-2003
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                                                                                                                                                                                                                                                     Sequence
                                                                                                                                                                                                                                                                                                                                             potentially useful for treating diseases associated with abnormal
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (MOLE-) MOLECULAR ENGINES LAB
                                                             480
16
                                                                                                                              15;
                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                            17
GTGCAGTGGTGCGATC 1
                                                             GTGCAGTGGTGATC 495
                                                                                                                                                                                                                                                                                                                         Ģ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               acid encoding human prostate membrane-specific antigen, for treatment of tumors and viral infection, also related and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Page 724;
                                                                                                                                                                                                                                                     BP; 4 A;
                                                                                                                              Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                         the nucleotides
                                                                                                                                                     1.5%;
                                                                                                                                                                                                                                                     7 C; 4 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tuijnder M;
                                                                                                                              0
                                                                                                                                                            Score 14.4; DB 1
Pred. No. 1.8e+03
                                                                                                                              Mismatches
                                                                                                                                                                                           DB 1;
                                                                                                                                                                                       Length 17;
                                                                                                                                 Indels
                                                                                                                              0;
                                                                                                                                 Gaps
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RESULT 2236 ADB45950/c ID ADB4595

ADB45950 standard; DNA; 17

ВР

29-JAN-2004

(first entry)

ADE30865;

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0

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ADE30865/
ID ADE3
XX
AC ADE3
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DT 29-J
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Canalysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can be used to screen for their specific interactive molecules.

Calso be used to screen for their specific interactive molecules.
                                                                                                                                                        RESULT 2237
                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                 Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              useful e.g.
polypeptide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; 88; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizoph;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               diagnosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Tumour suppression/reversion associated nucleotide #6273
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         17-SEP-2002; 2002WO-IB004219
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                18-DEC-2003 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADB45950;
                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Disclosure; Page 765; 771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2003-441574/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 17-SEP-2001; 2001FR-00011981.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            15-MAY-2003
                                                                                                     ADE30865 standard; DNA;
                                                                                                                                                                                                                                                                                                                                                           Local
                                                                                                                                                                                                                                                                           654 GTGCAGTGGCGCAATC 669
                                                                                                                                                                                                                                16
                                                                                                                                                                                                                                                                                                                                                         Similarity
                                                                                                                                                                                                                                   GTGCAGTGGCGCGATC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                acid encoding human prostate membrane-specific antigen, for treatment of tumors and viral infection, also relat
                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           and antibodies.
                                                                                                                                                                                                                                                                                                                                   Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                      A;
                                                                                                                                                                                                                                                                                                                                                           1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                      8 C; 4 G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tuijnder
                                                                                                        17
                                                                                                                                                                                                                                   \vdash
                                                                                                           ΒP
                                                                                                                                                                                                                                                                                                                                      0
                                                                                                                                                                                                                                                                                                                                                           Score 14.4; DB 1;
Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                         T;
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                                                                                                                                                                                                                                                                                                                                                                                                                                            0 Other;
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neimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                      Length 17;
                                                                                                                                                                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                         0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        related
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RESULT 2238
ADE30723/c
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Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         obesity; athersclerosis; diabetes mellitus; coronary artery heart disease; cholesterol homeostasis; ss; differntial expression.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Polynucleotides differentially regulated in response to cholesterol and adipogenesis are useful to detect and treat associated conditions such obesity, athersclerosis, diabetes mellitus and coronary artery heart
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Cholesterol homeostasis/adipogenesis related DNA seq id
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo
                                                                                           obesity; athersclerosis; diabetes mellitus; coronary artery heart disease; cholesterol homeostasis; ss;
                                                                                                                     expression vector; anorectic; antiarteriosclerotic; antidiabetic; elevated cholesterol; elevated lipid;
                                                                                                                                                                                                                                          ADE30723 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               obesity,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     09-JAN-2002; 2002US-0347286P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                08-JAN-2003; 2003US-00339793
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               expression vector; anorectic; antiarteriosclerotic; antidiabetic; elevated cholesterol; elevated lipid;
                          US2003180764-A1
                                                    Homo sapiens
                                                                               differntial expression.
                                                                                                                                                              Cholesterol
                                                                                                                                                                                         29-JAN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (LYNX-) LYNX THERAPEUTICS INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           25-SEP-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               sapiens.
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                                                                                                                                                                                                                                                                                                                                        480
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                                                                                                                                                                                                                                                                                                                                                                                 Similarity
                                                                                                                                                                                                                                                                                                                                         GTGCAGTGGTGATC 495
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SEQ ID
                                                                                                                                                              homeostasis/adipogenesis related
                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 4 A;
                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ö
                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                        7 C; 4 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       59pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     diabetes mellitus;
                                                                                                                                                                                                                                                                                                                                                                    0
                                                                                                                                                                                                                                                                                                                                                                                 Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          English.
                                                                                                                                                                                                                                                                                                                                                                    Mismatches
                                                                                                        mellitus;
                                                                                                                                                                                                                                                                                                                                                                                             DB 1;
                                                                                                                                                             DNA
                                                                                                                                                              seq
                                                                                                                                                                                                                                                                                                                                                                                            Length 17;
                                                                                                                                                                                                                                                                                                                                                                   Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cardiant;
adipogenesis;
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adipogenesis;
                                                                                                                                                              id 110
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RESULT 2239
ADH59597/c
ID ADH5959
XX ADH5959
XC ADH5959
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Best Local Similarity
Matches 15; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The invention describes a composition comprising at least one expression vector comprising a polynucleotide of the invention. The composition has anorectic, antiarteriosclerotic, cardiant and antidiabetic properties. The invention is used to detect and treat conditions associated with elevated cholesterol and lipid or during adipogenesis, particularly obesity, athersclerosis, diabetes mellitus or coronary artery heart disease. This sequence represents a polynucleotide differentially
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Polynucleotides differentially regulated in response to cholesterol adipogenesis are useful to detect and treat associated conditions supposity, athersclerosis, diabetes mellitus and coronary artery heart
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    08-JAN-2003;
                                                      Non-nucleotide probe for suppressing binding of detectable nucleic acid probes to undesired sequences, has aggregate nucleobase sequence homologous to randomly distributed repeat sequence of genomic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Non-nucleotide probe of the invention #1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-MAR-2004
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                                                                                                                                                                                                                          Kirtsen
                                                                                                                                                                                                                                                                                                                                                          24-SEP-2001; 2001US-0324499P.
                                                                                                                                                                                                                                                                                                                                                                                                                      24-SEP-2002; 2002WO-US030573.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     non-nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADH59597;
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                                                                                                                                                                                                                                                                              (BOST-) BOSTON PROBES INC.
                                                                                                                                                                                                                                                                                (DAKO-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   993
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
nilarity 93.8%;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           THERAPEUTICS
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                                                                                                                                                                                                                        Hyldig-Nielsen JJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  probe; Bacterial Artificial
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     2 A; 6 C; 6 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           cholesterol homeostasis and adipogenesis.
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Pred. No. 1.
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Claim 10;

SEQ ID

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3; 103pp; English.

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ADI49563
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cell, and the sample is metaphase spreads, interphase nucleic or nucleic cell, and the sample is metaphase spreads, interphase nucleic or nucleic found in paraffin embedded tissue material or frozen tissue sections. The probe is also useful in comparing a sample of genomic nucleic acid with that of a control sample using a genomic nucleic acid reference array. The method comprises treating a sample of genomic nucleic acid and control genomic nucleic acid and the array with the mixture of the probe under suitable hybridization conditions, contacting the array with treated mixture of sample and control genomic nucleic acid under suitable hybridization conditions, and comparing the intensities of the signals from the differential labels of the array to that caused by hybridization of the probes to genomic nucleic acid, thus determining one or more variations in copy numbers of sequences in the determining one or more variations in copy numbers of substantially identical sequences in the control. The hybridization of the genomic array is determined using an intercalating dye or a detectable antibody, or its fragment, that is specific for a nucleic acid/nucleic acid hybrid. The sample of genomic nucleic acid to be tested and the reference of nucleic acid are labelled with detectable moiety such that hybridization of the genomic array is determined by determining the presence, absence, amount or location of the detectable moiety such that hybridization of the detectable moiety such that hybridization of the genomic array comprises nucleic acid that is prepared from Bacterial Artificial Chromosome (BAC) clones. The presence from the one or more genomic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present sequence represents a non-nucleotide probe. The probe is useful for suppressing the binding of one or more detectable nucleic acid probes, that are greater than 100 base pairs and that have been derived from genomic nucleic acid, to one or more undesired sequences in an assay for determining target genomic nucleic acid of a sample. The method comprises contacting the sample with the mixture of probes (preferably comprising 5-50 probes), contacting the sample with the one or more detectable nucleic acid probes, and determining the target genomic nucleic acid of the sample by determining the hybridization of the one or more detectable nucleic acid probes to the target genomic nucleic acid of the sample. The genomic nucleic acid is contained in a fixed tissue or a coll of the sample by determining the hybridization of the sample.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 17
                                                                                                                                                                                                                                                                                       primer; PCR;
                                                                                                                                                                                                                                                                                                             cytostati
                                                                                                                                                                                                                                                                                                                                   tumour suppression; tumour reversion; apoptosis; virus resistance;
                                                                                                                                                                                                                                                                                                                                                                                       Human tumour suppression/reversion-related DNA sequence SeqID2066
                                                                                                                                                                                                                                                                                                                                                                                                                                              15-APR-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADI49563 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    represents a non-nucleotide probe of the invention.
17-SEP-2001;
                                                 17-SEP-2002; 2002WO-IB004523
                                                                                                                                                      WO2003025177-A2
                                                                                                     27-MAR-2003
                                                                                                                                                                                                          Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         882 AGCCACCACGCCGGC 897
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       17 AGCCACCGCGCCCGGC 2
                                                                                                                                                                                                                                                                                                             virucide; neuroprotective;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 0 A; 5 C; 10 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                  virucide; neuroprotective; nootropic; neuroleptic; probe;
gene chip; antisense; viral disease; tumour;
2001FR-00011980
                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        93.8%;
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Score 14.4; DB 1; Length 17; Pred. No. 1.8e+03; O; Mismatches 1; Indels

0; Gaps

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PRINCE SERVING SERVING
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CC Note: The sequence data for this patent did not form part of the printed construction, but was obtained in electronic format directly from WIPO can feel the print of the print 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Matches
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; SEQ ID NO 2066; 30pp; French
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              tumour suppression; tumour reversion; apoptosis; virus resistance;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15-APR-2004
New isolated nucleic acid, useful for treating viral diseases associated
                                                                                         WPI; 2003-313354/30.
                                                                                                                                                                                                                                                                                                                               17-SEP-2001; 2001FR-00011980.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human tumour
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ADI51563
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                                                                                                                                                                 Telerman A,
                                                                                                                                                                                                                                                           (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ftp.wipo.int/pub/publishedpct_sequences
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                                                                                                                                                                 Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        suppression/reversion-related DNA sequence SeqID4066.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (first entry)
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0; Mismatches
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Pred. No. 1.8e+03;
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RESULT 2242
AD147683/c
ID AD147683;
XX
AC AD147683;
XX
AC AD147683;
XX
DT 15-APR-2004 (first entry)
XX
DT 15-APR-2004 (first entry)
XX
DE Human tumour suppression/reve
XX
DE Human tumour suppression; tumour re
Cycostatic; virucide; neuropi
KW cycostatic; virucide; neuropi
KW cycostatic; virucide; antis
KW cycostatic; virucide; antis
KW cycostatic; virucide; antis
KW cycostatic; virucide; neuropi
KW primer; PCR; gene chip; antis
KW cycostatic; virucide; antis
KW cycostatic; virucide; antis
KW cycostatic; virucide; antis
KW cycostatic; virucide; antis
KW tumour suppression/reve
KW tumour suppression/reve
KW tumour suppression/reve
XX

MO2003025177-A2.
XX
PD W02003025177-A2.
XX
PD 17-SEP-2002; 2002WO-IB004523
XX
PP 17-SEP-2001; 2001FR-00011980
XX
PP 17-SEP-2001; 2002WO-IB004523
XX
PP 17-SEP-2001; 2002WO-IB004523
XX
PP 17-SEP-2001; 2002WO-IB004523
XX
PP 17-SEP-2001; 2002WO-IB004523
XX
PP 17-SEP-2001; 2002FR-00011980

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             This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the
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This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration,
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                                                                                       This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention.

CC Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO or treatment.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cell degeneration, cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
93.8%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0;
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 17;
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ATCTAGGCTCACTGCA 17 ATCTTGGCTCACTGCA 682 Matches

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RESULT
ADI5272
                                                                               in the phenomena of tumour suppression, tumour reversion, apoptosis CC and/or resistance to viruses. The invention may be useful for the CC development of compounds with a cytostatic, virucide, neuroprotective, conotropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in CC vitro as antisense reagents and for production of recombinant comparation of polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that cre characterised by development of tumours or cell degeneration. The specifically cancer but also Alzheimer's disease and schizophrenia. The control of the squence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO at fifth the printed specification, but was obtained in electronic format directly from WIPO at fifth the printed specification, but was obtained in electronic format directly from WIPO at fifth the printed specification, but was obtained specification.
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        cytostatic; virucide; neuroprotective; nootropic; neuroleptic; primer; PCR; gene chip; antisense; viral disease; tumour;
                                                         Sequence
                                                                                                                                                                                                                                                                                                                       This
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      tumour suppression; tumour reversion;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human tumour
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                                                                                                                                                                                                                                                                                                                                                     Disclosure; SEQ ID NO 5225; 30pp; French
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Telerman
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                                                                                                                                                                                                                                                                                                                    invention relates to novel isolated nucleic acid sequences involved
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l Similarity
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                                                          BP;
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              1.5%;
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                                                            G; 4 T; 0
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Pred. No. 1.8e+03;
               Score 14.4;
Pred. No. 1
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                                                                                                                                                                                                                                                                                                                                                                                                  for treating viral diseases, also related polypeptides,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         apoptosis; virus
                                                             ₽
                                                             0 Other
                 8e+03
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                                                                                                                                                                                                                                                                                                                                                                                                   associated antibodies
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RESULT 2247
ADI52737/c
ID ADI5273
XX
AC ADI5273
XX
AC ADI5273
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TX
AC ADI5273
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ADI52147/c
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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                         development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention. Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO at fifth. wipo.int/pub/publishedpct_sequences
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            primer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schirochic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADI52147;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human tumour suppression/reversion-related DNA sequence SeqID4650
   15-APR-2004
                                    ADI52737
                                                                    ADIS2737 standard; DNA; 17
                                                                                                                                                                                                                                                                                     Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; SEQ ID NO 4650; 30pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17-SEP-2001; 2001FR-00011980.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      and/or resistance to viruses.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      and transfected
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      invention relates to novel isolated nucleic acid sequences involved
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  phenomena of tumour suppression, tumour reversion, apoptosis resistance to viruses. The invention may be useful for the
                                                                                                                                                                                                                  l Similarity
15; Conserv
                                                                                                                                                                                    GTGCAGTGGTGATC 495
                                                                                                                                                    GTGCAGTGGCGTGATC
                                                                                                                                                                                                                   Conservative
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   (first entry),
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      cells.
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                                                                                                                                                                                                                                                                                   8 C; 3 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                 93.8%;
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                                                                                                                                                                                                                                   Score 14.4; DB 1;
Pred. No. 1.8e+03;
                                                                                                                                                                                                                       Mismatches
                                                                                                                                                                                                                                                  Length 17
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RESULT 2248
ADI49735
ID ADI4973
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AC ADI4973
XY
DT 15-APRXX
DE Human t
XX
KW tumour
KW tumour
KW cytosta
KW primer;
KW cell de
XX

15-APR-2004

(first entry)

ADI49735 standard;

DNA;

17 ₿P

tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds; hur

schizophrenia; ds; human.

suppression/reversion-related DNA sequence SeqID2238

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480 GTGCAGTGGTGATC 495

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GTGCAGTGGTGCGATC

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and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virusde, neuroprotective, concorropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tunours or cell degeneration, separation of specifically cancer but also Alzheimer's disease and schizophrenia. The Note: The sequence is that of a nucleic acid sequence of the invention.

Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO as for which in the comment of the comment of the printed specification, but was obtained in electronic format directly from WIPO
Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Homo
                                                                                                                                              Sequence 17 BP; 4 A; 7 C; 4 G; 2 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-313354/30.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                17-SEP-2002; 2002WO-IB004523.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; SEQ ID NO 5240; 30pp; French
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                                      Local
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                                      Similarity
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Conservative
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                              1.5%;
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                                      Pred. No.
                                                                     Score 14.4;
       Mismatches
                                      1.8e+03;
                                                                        DB 1; Length 17;
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Gaps
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RESULT 2249
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheiner's disease and schizophrenia. The
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           present sequence is that of a nucleic acid sequence of the Note: The sequence data for this patent did not form part o specification, but was obtained in electronic format direct at ftp.wipo.int/pub/publishedpct_sequences
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            This invention relates to novel isolated nucleic acid sequences involved
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       17-SEP-2001; 2001FR-00011980
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                                                                                                                                       tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroptective; noctropic; neuroleptic; proprimer; PCR; gene chip; antisense; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; ds;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (MOLE-) MOLECULAR ENGINES LAB
               17-SEP-2002; 2002WO-IB004523
                                                                                                                                                                                                                        Human tumour
                                                                                                                                                                                                                                                       15-APR-2004
                                                                                                                                                                                                                                                                                                                  ADI51656 standard; DNA; 17
                                                27-MAR-2003.
                                                                              WO2003025177-A2
                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                    869 GATTACAGGCGTGAGC 884
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                BP; 5
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                        suppression/reversion-related DNA sequence
                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                A; 4 C; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 14.4; D
Pred. No. 1.8e
0; Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                form part of the printed 
ormat directly from WIPO
                                                                                                                                            schizophrenia; ds; human
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
                                                                                                                                                                                                                        SeqID4159
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                invention.
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                                                                                                                                                                         probe;
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ADI52090/
ID ADI5
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Best Local S
Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    in the phenomena of tumour suppression, tumour reversion, apoptoss and/or resistance to viruses. The invention may be useful for the
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                                                                                                                                                                                                                                                                           tumour suppression; tumour reversion; apoptosis; virus resistance;
cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe;
primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure;
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                                                                                                                                                                   27-MAR-2003
                                                                                                                                                                                                                                                                                                                                            Human tumour
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              This invention relates to novel isolated nucleic acid sequences involved
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (MOLE-) MOLECULAR ENGINES LAB
                WPI; 2003-313354/30
                                                                                                         17-SEP-2001; 2001FR-00011980
                                                                                                                                     17-SEP-2002;
                                                                                                                                                                                                   WO2003025177-A2
                                                                                                                                                                                                                                 Homo sapiens
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ftp.wipo.int/pub/publishedpct_sequences
                                                                                                                                                                                                                                                              degeneration; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                492 GATCACAGCTCACTGC 507
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                            MOLECULAR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      GATCTCAGCTCACTGC 16
                                             P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             BP; 3 A;
                                                                                                                                       2002WO-IB004523
                                                                                                                                                                                                                                                                                                                                         suppression/reversion-related DNA sequence SeqID4593.
                                               Amson R,
                                                                                                                                                                                                                                                                                                                                                                             (first entry)
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                                                                              ENGINES LAB
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                                               Tuijnder M;
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Pred. No. 1
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                                                                                                                                                                                                                                                                 disease;
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ADI49985
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Best Local S
Matches 15
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New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe;
primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human tumour suppression/reversion-related DNA sequence SeqID2488
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                                                                                                                                                                                                                   Telerman A,
                                                                                                                                                                                                                                                                                                                                                            17-SEP-2001; 2001FR-00011980
                                                                                                                                                                                                                                                                                                                                                                                                                                  17-SEP-2002; 2002WO-IB004523
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                                                                                                                                                2003-313354/30.
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15; Conserv
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                                                                                                                                                                                                               Amson R,
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93.8%;
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Pred. No. 1.8e
0; Mismatches
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This invention relates to novel isolated nucleic acid sequences involved

in the phenomena of tumour suppression, tumour reversion, apoptosis

Disclosure; SEQ ID NO 2488; 30pp; French

in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, vitro as antisense reagents and for production of recombinant polypeptides. The invention may therefore be useful for preparation of polypeptides. The invention may therefore be useful for preparation of polypeptides.

prevention and/or treatment

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viral diseases that

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invention relates to novel isolated

nucleic acid sequences involved

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RESULT 2252
ADI52788/c
ID ADI5278
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                                                                                                                                                                                                    New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                  WPI; 2003-313354/30.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 2 A; 7 C; 3 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            WO2003025177-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human tumour suppression/reversion-related DNA sequence
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                                                                                                                                                                     Disclosure; SEQ ID NO 5291; 30pp; French
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mes 15; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          cancer; Alzheimer's disease;
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                                                                                                                                                                                                                                                                                                  Tuijnder M;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          schizophrenia; ds; human.
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                                                                            cc in the phenomena of tumour suppression, tumour reversion, apported and/or resistance to viruses. The invention may be useful for the concording to the contropic or neurolegatic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or camplifying nucleic acid, for example as one component of agene chip, in cylino as antisense reagents and for production of recombinant cyling and/or polypeptides. The invention may therefore be useful for preparation of convergence is that of an uncleic acid sequence of the invention.

Cc specifically cancer but also Alzheimer's disease and schizophrenia. The present sequence is that of a nucleic acid sequence of the invention.

Cc Note: The sequence data for this patent did not form part of the printed capteristication, but was obtained in electronic format directly from WIFO capteristication, but was obtained in electronic format directly from WIFO capteristication, but was obtained in electronic format directly from WIFO capteristication.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New isolated nucleic acid, useful with tumors and cell degeneration, and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cytostatic; virucide; neuroprotective; nootropic; neuroleptic; primer; PCR; gene chip; antisense; viral disease; tumour;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      This invention relates to novel isolated nucleic acid sequences involved
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15; Conserv
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Pred. No. 1.
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                                                                                    This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant conviro as antisense reagents and for production of recombinant of polypeptides. The invention may therefore be useful for preparation of polypeptides. The invention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, appendic acid are characterised by development of tumours or cell degeneration. The specifically cancer but also Alzheimer's disease and schizophrenia. The sequence data for this patent did not form apart of the printed specification, but was obtained in electronic format directly from WIPO
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure;
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      BP; 3 A; 7 C; 4 G; 3 T; 0 U; 0 Other;
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ation; cancer; Alzheimer's d
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Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length
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RESULT 2256
ACC53368/c
ID ACC5336
XX ACC5336
XX ACC5336
XX PM ENGRE Human t
XX BS; tun
KW tumour
KW tumour
KW tumour
KW cellula
XX
OS Homo sa
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PN FR2826:
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ADI20628
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                                                                                                                                                                                                                                                                                                       Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                The present invention relates to identifying an eRNA or a DNA sequence comprising an eRNA-encoding sequence in the nucleome of a eukaryotic cell comprises identifying non-protein-encoding nucleotide sequences within an mRNA transcript or a DNA sequence encoding same in the nucleome. The methods are useful for identifying an eRNA or DNA for modifying a genetic network in cell to alter the cells phenotype. The present sequence represents a putative eRNA sequence of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ds; eRNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADI20628 standard;
                                                   tumour regression; apocellular degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             19-SEP-2001; 2001US-0324127P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       19-SEP-2002; 2002WO-AU001286
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Saccharomyces cerevisiae.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15-APR-2004
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    FR2826373-A1
                            Homo sapiens
                                                                                                      Human tumour suppressor sequence #2135.
                                                                                                                                                                                   ACC53368 standard; DNA; 17 BP
                                                                                                                                                                                                                                                                                                                                                           Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Identifying an eRNA or a DNA sequence comprising an eRNA-encoding sequence in the nucleome of a eukaryotic cell, comprising identifying protein-encoding nucleotide sequences within an mRNA transcript or a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Mattick J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Putative eRNA sequence #37
                                                                               ss; tumour suppressor; antitumour; cytostatic; tumour suppression;
                                                                                                                                  27-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Example 14; SEQ ID NO 118; 137pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2003-371830/35
                                                                                                                                                                                                                                                                        163 TTTTGTATTTTTTTT 178
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                                                                                                                                                                                                                                                                                                       1 Similarity
15; Conserv
                                                                                                                                                                                                                                                      TTTTGAATTTTTTTT 17
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                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                           BP; 2 A;
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                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     DNA;
                                                                apoptosis; virus
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                                                                                                                                                                                                                                                                                                                  1.5%;
                                                                                                                                                                                                                                                                                                                                                        0 C; 1 G; 14 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Stanley
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0; Mismatches
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Pred. No. 1.8e+03;
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                                                                  resistance;
                                                                  diagnosis;
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RESULT 2257
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Best Local Similarity
Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                This sequence represents an isolated nucleic acid sequence associated with tumour suppression or regression, apoptosis or virus resistance. Invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    New nucleic acid sequences associated with tumor suppression, appoptosis or virus resistance are useful to diagnose and treat disease, development of tumor cells and cell degeneration.
                    New nucleic acid sequences associated with tumor suppression, regression, apoptosis or virus resistance are useful to diagnose and treat viral disease, development of tumor cells and cell degeneration.
                                                                                                                                                                                                                                                                                            ss; tumour suppressor; antitumour; cytostatic; tumour suppression;
tumour regression; apoptosis; virus resistance; diagnosis;
cellular degeneration.
                                                                                                                                                                                                                                                                                                                                                 Human tumour suppressor sequence #2782.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 17 BP; 2 A; 4 C; 7 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 1; Page 533;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          20-JUN-2001; 2001FR-00008139.
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                                                                                                                                                                                                                                                                                                                                                                                                       ACC54015;
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                                                                            WPI; 2003-250498/25.
                                                                                                      Tuijnder M,
                                                                                                                                                                                                                                                                  Homo sapiens.
                                                                                                                                (MOLE-) MOLECULAR ENGINES LAB SA.
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                                                                                                      Telerman
                                                                                                                                                         2001FR-00008139.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             798pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
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                                                                                                      Amson R;
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Pred. No. 1.8e+03;
0; Mismatches 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DB 1;
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t viral
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Claim 1; Page 682; 798pp; French.

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RESULT 2258
ACC52025
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Matches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to disgnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           This sequence represents an isolated nucleic acid sequence associated with tumour suppression or regression, apoptosis or virus resistance invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17 BP; 2 A; 6 C; 4 G; 5 T; 0 U; 0 Other;
                                                                                                                                  This sequence represents an isolated nucleic acid sequence associated with tumour suppression or regression, apoptosis or virus resistance. invention relates to these sequences or sequences having at least 80% identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     cellular degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    tumour regression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ss; tumour suppressor; antitumour; cytostatic; tumour suppression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human tumour suppressor sequence #792.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       27-JUN-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  FR2826373-A1.
                                                                                                                                                                                                                                                 Claim 1;
                                                                                                                                                                                                                                                                                      New nucleic acid sequences associated with tumor suppression, rapoptosis or virus resistance are useful to diagnose and treat
                                                                                                                                                                                                                                                                                                                                                                                                                 20-JUN-2001; 2001FR-00008139
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                                                                                                                                                                                                                                                                                                                                                                                      (MOLE-) MOLECULAR ENGINES LAB SA.
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15; Conserv
  N
                                                                    Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 GATCTGCCTGCCTCAG 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    GATCTGCCTGCCTCGG 852
                                                                                                                                                                                                                                               Page
                                                                                                             17
                 ATCTTGGCTCACTGCA 682
                                                                                                                                                                                                                                                                            development of tumor cells
  ATCATGGCTCACTGCA 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                           BP; 4 A;
                                                       Conservative
                                                                                                                                                                                                                                                                                                                                                           Telerman
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                                                                                                                                                                                                                                              223; 798pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    apoptosis; virus resistance; diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      93.8%;
                                                                   1.5%;
                                                                                                           5 C; 4 G; 4 T; 0 U;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 14.4;
                                                                   Score 14.4; DB 1
Pred. No. 1.8e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Mismatches
                                                         Mismatches
                                                                                                                                                                                                                                                                            and cell degeneration.
                                                                                                             0 Other;
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                                                                                 DB 1;
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                                                         Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human tumour suppressor sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ACC51578;
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                                                                                                                                                                                                                                                                                                                                                                                                                                             New nucleic acid sequences associated with tumor suppression, a apoptosis or virus resistance are useful to diagnose and treat disease, development of tumor cells and cell degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 27-DEC-2002.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       cellular degeneration.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            27-JUN-2003
                                          tumour regression;
                                              ss; tumour suppressor; antitumour; cytostatic; tumour suppression;
tumour regression; apoptosis; virus resistance; diagnosis;
                                                                                                                                                                                                                                                                                                     Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   20-JUN-2001; 2001FR-00008139
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                                  cellular
                                                                               Human tumour
                                                                                                     27-JUN-2003
                                                                                                                                                  ACC53015
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                                                                                                                                                                                                                                                                     Local
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                                                                                                                                                                                                                                  480 GTGCAGTGGTGATC 495
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                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                           GTGCAGTGGCGTGATC
                                                                                                                                                  standard; DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              suppressor;
                                                                                                                                                                                                                                                                                                        BP; 5 A; 7 C; 3 G; 2 T; 0 U;
                                                                                                                                                                                                                                                          Conservative
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                                                                              suppressor sequence
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                                             apoptosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             entry)
                                                                                                     entry)
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                                                                                                                                                                                                                                                                                 1.5%;
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Pred. No. 1.8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     virus resistance; diagnosis;
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                                                                                                                                                                                                                                                            Mismatches
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                                                                                #1782
                                                                                                                                                                                                                                                                                  DB 1;
                                                                                                                                                                                                                                                                                                         0 Other;
                                                                                                                                                                                                                                                                                  Length 17;
                                                                                                                                                                                                                                                             Indels
                                                                                                                                                                                                                                                            0;
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Homo sapiens

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        New nucleic acid sequences associated with tumor suppression, regression, apoptosis or virus resistance are useful to diagnose and treat viral disease, development of tumor cells and cell degeneration.
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                                                                             with tumour suppression or regression, apoptosis or virus resist invention relates to these sequences or sequences having at lest identity to them, and polypeptides encoded by the sequences or polypeptides having 80% identity to the polypeptide sequences. Invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degene
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         polypeptides having 80% identity to the polypeptide sequences. The invention is used to diagnose or treat viral disease or disease characterized by development of tumour cells or cellular degeneration
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                            antisense oligonucleotide;
prostaglandin D2 receptor;
                                                                                                                                          Human PKR
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 17
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                                                                                                                                                                                                                                ADL50217;
                                                                                                                                                                                                                                                                        ADL50217 standard; RNA; 17
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12; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                 GCUGGAGUGCAAUGAC 16
                                                                                                                                          substrate sequence #1331.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               sequence.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
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                                                                            neurite growth inhibitor; NOGO; PTGDR; IkappaB kinase; IKK;
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Pred. No. 1
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                 cord injury; cancer;
rheumatoid arthritis;
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RESULT 2266
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AC ADL4944
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DT 20-MAY-
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DT 20-MAY-
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Antisen
KW prostag
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KW central
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that down regulate the expression or inhibit the function of a receptor

for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),

KappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the

invention are useful for treating: cerebrovascular accident, central

cervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,

lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,

restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune

disease, lupus, multiple sclerosis, transplant/graft rejection,

ischaemia/reperfusion injury, glomernlonephritis, sepsis, and allergic

conditions (e.g. asthma, allergic rhintis or atopic dermatitis). The

nucleic acids of the invention are also useful for down-regulating the

expression of a target gene and as a diagnostic tool to examine genetic

drifts and mutations within diseased cells or to detect the presence of a
                                                                                                                                                                                                                                                                                                                                                       Matches
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Best Local
antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord inj melanoma; lymphoma; glioma; inflammatory disease; rheumato
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      restenosis; asthma; Crohn' autoimmune disease; lupus; graft rejection; ischaemia allergy; asthma; allergic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase o protein kinase PKR genes, for treating cancer and inflammatory disease
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29-MAY-2001; 2001US-0294412P.
                                                                                                                                                                                                      ADL49442 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17 BP; 2 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                     substrate sequence.
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12; Conserv
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                                                                                                                                    entry)
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75.0%;
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   cord injury; cancer;
rheumatoid arthritis;
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ADL50746
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Matches
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             antisense oligonucleotide; neurite growth inhibitor; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKi protein kinase pKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  05-APR-2001; 2001US-00827395.
29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or
in kinase PKR genes, for treating cancer and inflammatory disease.
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                                                                                                substrate
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 ry; CNS injury; inflammatory d
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Pred.
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1.8e+03;
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y; spinal cord injury;
disease; rheumatoid ar
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                                                                 NOGO
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   y; cancer; arthritis;
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CC that down regulate the expression or inhibit the function of a receptor (PTGDR), CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC ReappaB kinase (IRK), or protein kinase PRR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central comparison or glioma), inflammatory disease (e.g. rheumatoid arthritis, liftammatory disease, e.g. rheumatoid arthritis, crestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lupus, multiple sclerosis, transplant/graft rejection, cc ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC conditions of a target gene and as a diagnostic tool to examine genetic conditions are also useful for down-regulating the captesion of a target gene and as a diagnostic tool to examine genetic conditions are also useful for down-regulating the conditio
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Best Local
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Best Local :
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29-MAY-2001;
28-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        03-APR-2002; 2002WO-US010512
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                                                    Human PKR substrate sequence #538.
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; 2001US-0294412P.
; 2001US-0315315P.
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Pred. No. 1.
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ls; sepsis;
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      arthritis;
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The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (CC that down regulate the expression or inhibit the function of a receptor (PTGDR) (CC flappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lugus, multiple sclerosis, transplant/graft rejection, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatiti). The CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The CC uncleic acids of the invention are also useful for down-regulating the CC crafts and mutations within diseased cells or to detect the presence of a carget RNA in a cell. The present RNA sequence represents a human PKR
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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Sequence 17 BP; 2 P 7 C; 2 G; 0 T; 6 **G**; 0 Other;

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Query Match Best Local Matches Similarity Conservative 1.5%; 4. Score 14.4; DB 1 Pred. No. 1.8e+03 Mismatches DB 1; Length Indels 0 Gaps 0

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20-MAY-2004 ADL49431; ADL49431 standard; RNA; 17 678 _ CTGCAACCTCTGCCTC 693 CUGCAACUUCUGCCUC 16 (first entry)

ADL49431
ID ADL
XX
AC ADL
AXX 20DT 20XX
XX
DB Hum
XX
KW ant
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KW cen
KW mell antisense oligonucleotide; neurite growth kinhibito prostaglandin D2 receptor; PTGOR; IkappaB kinase; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease; Human PKR substrate sequence #545. inhibitor; NOGO; kinase; IKK; cord injury; cancer;
rheumatoid arthritis;

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RESULT 2270
ADL49441
ID ADL4944
XX
AC ADL4944
XX
DT 20-MAY-
DX ADL4964
DX Human P
XX
ANT Sen
KW ANTISEN
KW Prostag
KW prostag
KW protein
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Best Local :
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGOR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord inj melanoma; lymphoma; glioma; inflammatory disease; rheumato
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                substrate sequence.
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10; Conserv
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                                                                                                 substrate sequence
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Pred. No. 1.8e+03;
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   cord injury; cancer;
rheumatoid arthritis;
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ls; sepsis;
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ADL49952
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AC ADL-
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AC ADL-
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DT 20-1
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DT 20-1
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                antisense oligonucleotide; neurite growth inhibitor; prostaglandin D2 receptor; PTGDR; Ikappas kinase; IK protein kinase pKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal col
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or
in kinase PKR genes, for treating cancer and inflammatory disease.
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 CNS injury; spinal cord injury; flammatory disease; rheumatoid a:
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Best Local S
Matches 12
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29-MAY-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascullar accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                  substrate sequence #1539
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; 2001US-0294412P.
; 2001US-0315315P.
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      arthritis;
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RESULT 2273
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CC that down regulate the expression or inhibit the function of a receptor
CC for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR),
CC RappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the
CC invention are useful for treating: cerebrovascular accident, central
CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,
CC restenosis or asthma), inflammatory disease (e.g. rheumatoid arthritis,
CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune
CC disease, lupus, multiple sclerosis, transplant/graft rejection,
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The
CC cucleic acids of the invention are also useful for down-regulating the
CC cucleic acids of the invention are also useful for down-regulating the
CC drifts and mutations within diseased cells or to detect the presence of a
CC target RNA in a cell. The present RNA sequence represents a human PKR
CC substrate segmence
                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                05-APR-2001; 2001US-00827395
29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
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 protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal melanoma; lymphoma; glioma; inflammatory disease;
                                                                                                Human PKR substrate sequence #566.
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                                                 prostaglandin D2
                                                               antisense oligonucleotide;
                                                                                                                               20-MAY-2004
                                                                                                                                                              ADL49452;
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12; Conserv
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                                            receptor; PTGDR; IkappaB kinase; IKI
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                                                                                                                               entry)
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Pred. No. 1.8e+03
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   cord injury; cancer;
rheumatoid arthritis;
                                                     IKK;
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restenosis; asthma;

Crohn's disease; diabetes;

obesity;

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ADL49925
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Chat down regulate the expression or inhibit the function of a receptor

Cfor a neurite growth inhibitor, NGGO, prostaglandin D2 receptor (PTGDR),

CI KappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the

invention are useful for treating: cerebrovascular accident, central

cereprous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma,

lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis,

crestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune

disease, lupus, multiple sclerosis, transplant/graft rejection,

crestenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune

disease, lupus, multiple sclerosis, transplant/graft rejection,

crestenosis or asthma, allergic rhinitis or atopic dermatitis). The

nucleic acids of the invention are also useful for down-regulating the

cappression of a target gene and as a diagnostic tool to examine genetic

crestension of a target gene and as a diagnostic tool to examine genetic

crestension of a target gene and as a diagnostic tool to examine genetic

crestension of a target gene and as a diagnostic tool to examine genetic

crestension of a target gene and as a diagnostic tool to examine genetic

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conditions of a target gene and as a diagnostic tool to examine genetic

conditions of a target gene and as a diagnostic tool to examine genetic
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antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PYGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord inj melanoma; lymphoma; glioma; inflammatory disease; rheumato
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Novel enzymatic nucleic acid that down-regulates expression growth inhibitor receptor, prostaglandin D2 receptor, Ikappa protein kinase PKR genes, for treating cancer and inflammato
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29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
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                                                                                                                                                                                 20-MAY-2004
                                                                                                                                                                                                                                                                     ADL49925 standard;
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12; Conserv
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                                                                                                                                                                                                                                                                     RNA; 17
                                                                                                                                   sequence
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Pred. No. 1.8e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mismatches
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  cord injury; cancer;
rheumatoid arthritis;
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tor, IkappaB kinase or
inflammatory disease.
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RESULT 2275
ADL50192
ID ADL5019
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AC ADL5019
XC ADL5019
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DT 20-MAYXX
DE Human P
XX
W antisen
KW prostag
KW protein
KW central
KW melanom

substrate

sequence entry)

20-MAY-2004

(first

ADL50192;

ADL50192 standard;

RNA;

17 ВP

problegianuam ve property of the protest of the pro

spinal cord injury;

arthritis;

IKK;

NOGO;

antisense oligonucleotide; neurite growth inhibitor;
prostaglandin D2 receptor; PTGDR; IkappaB kinase; IK
protein kinase PKR; cerebrovascular accident;

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GAUUCUCCUGCCUCAG

1006 GATTCTCCTGTCTCAG 1021

10;

Conservative

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Mismatches

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Gaps

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Similarity

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cc that down regulate the expression or inhibit the function of a receptor (Cf for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR), CC [RappaB kinase (IKK), or prottin kinase PKR. The nucleic acids of the cinvention are useful for treating: cerebrovascular accident, central Cf nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC [lymphoma or glioma], inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune Cf disease, lupus, multiple sclerosis, transplant/graft rejection, CC (ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The Cf conditions of a target gene and as a diagnostic tool to examine genetic Cf drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR conhertice agents of the invention are also useful to constitute the presence of a carget RNA in a cell. The present RNA sequence represents a human PKR conhertice agents and a cell.
Query Match
Best Local S
Matches 10
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Claim 59; SEQ ID NO 3458; 317pp; English.
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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                                                                                           Sequence 17 BP; 2 A; 6 C; 3 G; 0 T; 6 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                        The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   protein kinase PKR
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase o
in kinase PKR genes, for treating cancer and inflammatory disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     RIBOZYME PHARM INC
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                                                                                                                                       sequence.
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                       1.5%;
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                         Score 14.4;
Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      receptor, IkappaB kinase or er and inflammatory disease.
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                                            Length 17;
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RESULT 2276
ADL50735
ID ADL5073
XX
AC ADL5073
XX
DT 20-MAY-
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DT 20-MAY
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Unidentified
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29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
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   protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis
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                                                                                                         antisense oligonucleotide; neurite growth inhibitor; NOGO;
prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
                                                                                                                                                                                                                                                                                                                                                                                                                         ADL50735 standard; RNA;
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                                                                                                                                                                                                                  Human PKR substrate sequence #1849
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h inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or
in kinase PKR genes, for treating cancer and inflammatory disease.
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Pred. No. 1
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              arthritis;
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Forward

PCR

primer Ag6837 used to analyse human NOV expression.

11-MAR-2004

(first entry)

NOVX; antidiabetic; anorectic; cardiant; hypotensive; antiarteriosclerotic; anorectic; virucide; antibacterial; fungicide; protozoacide; nootropic; neuroprotective; antiparkinsonian; anticonvulgant; osteopathic; antiarthritic; antiinflammatory;

diabetes;

밁 5

665 CAATCTTGGCTCACTG

680 17

0

g)

CAGUCUUGGCUCACUG

RESULT 2277 ADH17665/c

ADH17665 standard; DNA; 17

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The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor (CC that down regulate the expression or inhibit the function of a receptor (PTGDR) (CC IRappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the CC invention are useful for treating: cerebrovascular accident, central CC nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, CC lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, CC restenosis or asthma), Crohn's disease, diabetes, obesity, autoimmune CC disease, lugus, multiple sclerosis, transplant/graft rejection, CC 'Ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitia). The CC cucleic acids of the invention are also useful for down-regulating the CC expression of a target gene and as a diagnostic tool to examine genetic CC drifts and mutations within diseased cells or to detect the presence of a crayet RNA in a cell. The present RNA sequence represents a human PKR contents a first researches.
 Matches
                   Query Match
Best Local 9
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 05-APR-2001; 2001US-00827395
29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; isohaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                               Claim
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                                                                          Sequence 17 BP; 3 A;
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                                                                                                              substrate sequence.
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 al Similarity
10; Conserv
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Conservative
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   Mismatches
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                                      Length 17;
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     Indels
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31-MAY-2002; 2002US-038321IP.
02-UUI-2002; 2002US-039333P.
09-AUG-2002; 2002US-0402154P.
09-AUG-2002; 2002US-0402171P.
09-AUG-2002; 2002US-0402204P.
09-AUG-2002; 2002US-0405175P.
22-AUG-2002; 2002US-0405175P.
23-SEP-2002; 2002US-0415175P.
23-SEP-2002; 2002US-0415175P.
23-SEP-2002; 2002US-0415175P.
23-SEP-2002; 2002US-0416561P.
antibacterial, fungicide, protozoacide, nootropic, neuroprotective, antibacterial, fungicide, protozoacide, nootropic, neuroprotective, antiinflammatory, dermatological, antiasthmatic and antilipaemic activities. The polypeptides, nucleic acid molecules and antibodies may be useful in the manufacture of a medicament for treating metabolic disorders, diabetes, obesity, infectious diseases (viral, bacterial, fungal, helminthic, and protozoal), anorexia, cancer, cardiovascular diseases including hypertension and atherosclerosis, neurodegenerative disorders, Alzheimer's disease, Parkinson's disease, epilepsy, immune disorders such as osteoarthritis, haemopoietic disorders, inflammatory skin disorders, asthma and various types of dyslipidaemia. The nucleic acids and polypeptides may also be used as targets for the identification of small molecules that modulate or inhibit neurogenesis, cell disferentiation, cell proliferation, haemopoiesis, wound healing and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Kekuda R, Li
Peterson JD,
                                                                                                                                                                                                                                                        The invention relates to a novel isolated NOVX polypeptide. The polypeptide of the invention demonstrates antidiabetic, anorectic, cardiant, hypotensive, antiarteriosclerotic, anorectic, virucide,
                                                                                                                                                                                                                                                                                                                                                                                          New isolated NOVX polypeptide, useful for preventing, distreating NOVX-associated disorders, e.g. osteoarthritis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         obesity; infection; anorexia; cancer; cardiovascular; hypertension; atherosclerosis; neurodegenerative; Alzheimer's disease; Parkinson's; epilepsy; immune; osteoarthritts; haemopoietic; inflammatory skin disorder; asthma; dyslipidaemia; neurogenesis; cell differentiation; proliferation; haemopoiesis; wound healing; angiogenesis; gene therapy; chromosome mapping; tissue typing; pharmacogenomic; human; PCR; primer; ss.
                                                                                                                                                                                                                                                                                                                                                                         atherosclerosis, cancer,
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ER, Gerlach VL, Gorman L,
Li L, Macdougall JR, Pad:
ID, Rastelli L, Shinkets R
M, Voss EZ, Zhong M;
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2; 2002US-0384296P.
2; 2002US-0384327P.
2; 2002US-0384327P.
2; 2002US-038521P.
2; 2002US-038521P.
2; 2002US-0395211P.
2; 2002US-0402171P.
2; 2002US-0402204P.
2; 2002US-0402205P.
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2002US-0384044P.
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an L, Grosse WM, Guo X, Ji W;
Padigaru M, Patturajan M;
ets RA, Spytek KA, Stone DJ;
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RESULT 2278
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ID ADI3512
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                                                                                     The invention relates to diagnosing a predisposition to fat deposition leanness in a subject comprising detecting the presence or absence of polymorphic variation associated with fat deposition at a polymorphic site in a PLA2GIB nucleotide sequence in a nucleic acid sample from a subject, where the presence of the polymorphic variation indicates a predisposition to fat deposition in the subject. The polymorphic variation is a guanine at position 7328 or thymine at position 9182 of the present sequence. The method is useful for diagnosing a predisposition to fat deposition or leanness in a subject, and consequently for diagnosing a predisposition to non-insulin dependent diabetes mellitus (NIDDM) in a subject and conditions such as hyperinsulihelitus. Or predisposition to fat deposition or leanness deposition such as hyperinsulihelitus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         angiogenesis, in gene therapy and the in generation of antibodies that bind immunospecifically to NOVX substances for use in therapeutic or diagnostic methods. The nucleic acids may be further used the hybridisation probes, in chromosome mapping, tissue typing, preventive medicine and pharmacogenomics. The current sequence is that of the human NOVX-related PCR primer which was used in the exemplification of the
      hypercoagulability, or microalbuminuria, which can lead to early prescription of preventive measures. Sequences ADI35114-ADI35129 represent PCR primers used for genotyping polymorphisms in a huma
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Diagnosing a predisposition to fat deposition or leanness, useful for diagnosing a predisposition to e.g. diabetes or hypertension, comprises detecting the presence of a polymorphism in the PLA2GIB nucleic acid from
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PLAGGIB; fat deposition; leanness; single nuclectide polymorphism; non-insulin dependent diabetes mellitus; NIDDM; hyperinsulinemia; hypertension; glucose intolerance; dyslipidemia; hypercoagulability; microalbuminuria; human; PCR; primer; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Example 2; Page
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      27-JUN-2002; 2002US-0392361P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                47; 91pp;
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93.8%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   English
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Pred. No. 1.
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RESULT 2280
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Best Local (
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                                                                                                                                                                                                                                                                                                                           The present invention relates to a polynucleotide isolated from a hur gene and is useful for detecting a single nucleotide polymorphism in human gene or for diagnosing of disease. The invention enables the detection of a single nucleotide polymorphism in a human gene. The
                                                                                                                                                                                                                                                                                                                                                                                                                       Novel polynucleotide useful for PCR amplification along with two DNA fragment from another set of sequences, or for detecting single nucleotide polymorphism in human gene.
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 glioma; brain
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                                                                                                                                                                                                                                                                                      Sequence
                            Human glioma
                                                        20-MAY-2004
                                                                                  ADK13208;
                                                                                                           ADK13208 standard;
                                                                                                                                                                                                                                                                                                                 present sequence represents a primer of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                Claim 2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (KAGA-) KAGAKU GIJUTSU SHINKO JIGYODAN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Local
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                                                                                                                                                                             CCACCATGCCAGGCTC 17
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                               endothelial marker
                                                       (first entry)
 tissue; neoplastic;
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                                                                                                             DNA; 17
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Pred. No. 1
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                            (GEM) long tag SEQ ID NO:386
  glioma endothelial marker; GEM;
                                                                                                                                                                                                                                               .8e+03;
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anticancer; antiglioma; immune response; cytostatic;
multi-drug sensitive glioma; human; long tag; ss.
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01-APR-2003; 2003US-0458978P-
                                                                                                                                                                                                                                                            WO2004016758-A2
                                                                                                                                                                                                                                                                                               Synthetic
                                                                                                                                                                                                                                                                                                              Homo sapiens
WPI; 2004-247973/23
                                      Madden SI,
                                                                      (GENZ ) GENZYME CORP.
                                                                                                                                                                                    15-AUG-2003; 2003WO-US025614
                                                                                                                                                                                                                        26-FEB-2004.
                                      Wang CJ,
                                                                          JOHNS HOPKINS.
                                      Cook BP,
                                      Lattera J,
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Diagnosing glioma by detecting expression product of any one of 255 genes, glioma endothelial markers, in brain tissue sample suspected of being neoplastic, and comparing the expression with expression in normal brain tissue sample.

Example SEQ ID NO 386; 114pp; English

CC of glioma. (M1) involves detecting an expression product of at least one CC gene (I) in a first brain tissue sample (T) suspected of being CC encoplastic, where (I) is chosen from any one of 255 genes (glioma CC endothelial markers (GEMs)) as given in specification, and comparing the CC expression of (I) in (T) with expression of (I) in (T) relative to CC (R), identifies (T) as likely to be neoplastic. Also described: (1) cc intribody that specifically binds to a extracellular epitope; (2) cc identifying (M2) glioma involves contacting cells of the glioma with an CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring an expression product of the at least one gene and CC (I), monitoring the compound as a potential anticancer drug if it decreases the expression of at least one gene; (3) identifying (M4) a test compound CC (I) (I) the compound as a potential anticancer drug if it decreases the expression of at least one gene; and (4) inducing (M5) an immune response to glioma involves administering to a mammal, a protein creative for a glioma cells, and as immune response inducers. (M1) is useful for treating multications captive glioma in a human. (M2) is useful for treating multications captive glioma in a mammal having glioma or in a mammal who has had a glioma surgically removed. The present sequence represents a human GEM consideration of the invention.

Sequence 17 BP; 1 ð 6 Ç ហ <u>ი</u> 5 T; 0 ď, 0 Other

밁 Ş Query Match Best Local S Matches 15 732 17 l Similarity AGCTGGGACTACAGGC 747 AGCTGGGACCACAGGC 2 1.5%; nilarity 93.8%; Conservative (0 Score 14.4; I Pred. No. 1.86 0; Mismatches .8e+03; DВ 1. Length 17; Indels 0 Gaps

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RESULT 2281 ADJ10024/c ID ADJ10024 standard; DNA; 17 BP.

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BXSXXXX
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                       fat deposition. The present invention describes methods to detect the presence or absence of these single nucleotide polymorphisms of PLAZGIB, in particular G7328A and T9182G, and subsequently provide treatment that reduces fat deposition. This treatment may consist of an appetite suppressant, a lipase inhibitor, a phospholipase inhibitor, an exercise regimen, a dietary regimen, psychological counselling, psychotherapy or psychotherapeutic. Accordingly, PLAZGIB is a target for reducing fat deposition and it can be used to treat both obesity and non-insulin
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                              15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                         dependent diabetes mellitus (NIDDM), as well as cardiovascular disorders such as hypertension. As such, it exhibits antidiabetic activity. This oligonucleotide sequence is a PCR primer used to amplify a region of interest (i.e. genotype SNPs) in human PLA2GIB DNA of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              fat reduction and disorders related to fat depositions. Specifically, it refers to polymorphic variations in the phospholipase A2 (PLA2G1B) DNA, which is located on chromosome 12q24 and has been associated with central
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                This invention relates to a novel candidate therapeutic agent useful for fat reduction and disorders related to fat depositions. Specifically, it refers to polymorphic variations in the phospholipase A2 (PLA2GIB) DNA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Identifying a candidate therapeutic for fat reduction, useful treating diabetes, by introducing a test molecule to a system PLAJCHB protein or nucleic acid, and determining the presence interaction between the compounds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      human; PCR; ss; fat reduction; fat deposition; phospholipase A2; PLA2G1B;
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                                                                 ADN06450;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    appetite suppressant; lipase inhibitor; exercise regimen; obesity;
non-insulin dependent diabetes mellitus; NIDDM; cardiovascular disorder;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     PCR primer 30 to genotype SNPs of human phopholipase A2 (PLA2G1B) DNA
                                                                                                   ADN06450 standard; DNA; 17
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Pred. No. 1.8e
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Human FLAP related microsatellite marker SEQ ID NO:98.

Query Match

Sequence

17

BP; 4 A; 4 C; 6 G;

0 Other; DB 1;

Score 14.4; 3 T; 0 U;

Length 17;

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CC infarction in an individual who has at least one risk factor chosen from CC an at-risk haplotype for myocardial infarction, an at-risk haplotype in CC the fillpoxygenase activating protein (FLAP) gene, a polymorphism in a CC FLAP nucleic acid and an at-risk polymorphism in the 5-lipoxygenase (5-CC chosen from diabetes, hypertension, hypercholesterolaemia, elevated CC lp(a), obesity, past or current smoker; in an individual having elevated CC inflammatory marker chosen from C-reactive protein (CRP), serum amyloid CC an inflammatory marker chosen from C-reactive protein (CRP), serum amyloid CC an inflammatory marker chosen from C-reactive protein (CRP), serum amyloid CC and protein for a chestion molecule (sVCAM), CC metalloprotease type-1, matrix metalloprotease type-2, matrix CC metalloprotease type-3 and matrix metalloprotease type-9; in an individual having increased low density lipoprotein (LDL) cholesterol cindividual having increased low density lipoprotein (LDL) cholesterol cindividual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an CC individual having increased low density lipoprotein (LDL) cholesterol; in an individual continual having increased low density lipoprotein (LDL) cholesterol; in an individual having increased low density lipoprotein (LDL) cholesterol; in an individual having allowed the coronary syndrome (ACS) cevent, stable angina; or in an individual who has atherosclerosis or who cc treation myocardial infarction (STEMI). The brance chosen from CC unstable angina; or in an individual having allowed the coronary syndrome chosen from CC unstable angina; or secure coronary synd
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                acute coronary syndrome; antiatherosclerotic; cardiant; antianginal; leukotriene biosynthesis inhibitor; leukotriene receptor antagonist; 5-lipoxygenase activating protein; FLAP; human; chromosome 13; chromosome 13q12; polymorphism; 5-lipoxygenase gene promoter; 5-LO gene promoter; diabetes; hypertension; hypercholesterolaemia; obesity; inflammatory marker; low density lipoprotein; cholesterol;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     syndrome (ACS) in an individual comprising administering (I). (I) has antiatherosclerotic, cardiant and antianginal activities, and can be used as a leukotriene biosynthesis inhibitor, and a leukotriene receptor antagonist. (I) can be use for the manufacture of a medicament for the treatment of myocardial infarction or susceptibility to myocardial
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Also
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Helgadottir A,
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21-FEB-2003;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present invention describes using a leukotriene synthesis inhibitor (I) for the manufacture of a medicament for the treatment of myocardial infarction or susceptibility to myocardial infarction in an individual. Also described is a method (MI) for the treatment of acute coronary
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (DECO-) DECODE GENETICS EHF.
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                                                                                                                                                                                                        as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is the of a Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human LOC338749 DNA which is located a
                                                                                                                                                                                                                                                The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer,
                                                                                                                                                                                                                                                                                                                                Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
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24-JUL-2003;
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                                                                                                                                                                            Sequence
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  26-AUG-2004
                      ADP09403;
                                                                                                                                                                                                chromosomal
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2003US-0490234P.
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                                                                                                                                                                                                                                                                                                                                                                                                Braun
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Pred. No. 1.
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                                                                            The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of a Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human LOC338749 DNA which is located at chromosomal position 11p15.3.
                                                                                                                                                                                                                                                                                                                                                Roth
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         breast cancer; cytostatic; chromosome 11p15.3; ss; PCI
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24-JUL-2003; 2003US-0490234P.
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                                                   Sequence 17
                                                                                                                                                                                                                                                                            or absence
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                                                                                                                                                                                                                                     Example
                                                                                                                                                                                                                                                               Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
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              Local
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1 Similarity
15; Conserv
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                                                                                                                                                                                                                                                                                                                                                Nelson MR,
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                                                        BP; 3 A; 7 C; 4 G;
 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                              2003WO-US037966
            1.5%;
                                                                                                                                                                                                                                     286pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             PCR;
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  Score 14.4; DB 1;
Pred. No. 1.8e+03;
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25-NOV-2003; 2003WO-US037966

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RESULT 2286
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Matches 15
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                                                     Kit for automated genotyping contg. pairs of PCR primers - designed to amplify polymorphic nucleotide repeat sequences, arranged in sets each with a characteristic fluorescence label, useful e.g. in detection of disease related genetic rearrangement.
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24-JUL-2003; 2003US-0490234P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              primer; polymerase chain reaction; PCR; linkage study; locus;
microsatellite marker sequence; automated genotyping; allele;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   y a subject at risk of breast cancer by detecting the presence of one or more nucleotide polymorphic variations, useful for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Page 82;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          preventing and/or treating breast cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
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                                                                                                                                                                                                                                                                                                        JOHNS HOPKINS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                set A)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sequence;
on; Homo s
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Braun
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             for marker D6S344, chromosome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Score 14.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sapiens; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Kammerer SM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .8e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1; Length 17;
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X22222222222222
                                                                    The method aims to provide a collection of highly reproducible microsatellite marker sequences (MMS) at approx. 10-50 cM intervals throughout the human genome which can be detectably labelled. The MMS are polymorphic, simple sequence repeats and can be used in automated genotyping. esp. fluorescence-based. The primers correspond to the unique DNA sequence surrounding each marker, and PCR is used to detect each polymorphism. When the MMS show considerable polymorphism (ie. a difference in the number of repeats) between individuals, the markers can be particularly informative. The MMS can be ideal for linkage studies. Kits comprise at least 4 groups, of at least 3 sets, each comprising labelled primers for PCR amplification of the DNA. Group 11 primer pairs are shown in AAQ95841-82. The published size range of the D6S344 allele is 139-159 bp, and the degree of heterozygosity in the population is
     Sequence
18 BP;
     w
     A; 7 C; 4
     G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                 MMS are
                                                                                                                                                                                                                                                                                              unique
                                                                                                                                                                                                                    can
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Query Match Best Local S Matches 15 15; Similarity Conservative 1.5%; 0 Score 14.4; Pred. No. 1. Mismatches 1.9e+03DB 1; Length 18 Indels 0, Gaps

0

밁 Ś 639 16 GTCACCCAGGCTGGAG GTGACCCAGGCTGGAG _ 654

AAX36673 PCR primer 13-JUL-1999 standard; DNA; 18 for marker D6S344. (first entry)

PCR primer; detection; glaucoma allele; haplotype analysis; chromosome 2; chromosome 6; GLC6p25; haplotype profile; presymptomatic glaucoma; ss. human; GLC1B;

sapiens.

WO9916899-A2.

08-APR-1999

29-SEP-1998;

98WO-CA000924.

30-SEP-1997; 97CA-02217097

(UYLA-) UNIV LAVAL

Raymond V, Morissette 'n Falardeau P, Cote ຸດ Anctil

WPI; 1999-263704/22

Haplotype analyses for indirect detection of glaucoma

Page 28; 41pp; English.

RESULT 2287
ANX36673/c
ID ANX3667
XX
ANX36673/c
ID ANX3667
XX
I 3-JUL
ID PCR pr
XX
PCR This sequence represents a PCR primer used in the method of the invention. The method is for detecting the presence of alleles for glaucoma comprising haplotype analysis of human chromosome 2 and 6 respectively, where the haplotypes are associated with loci GLC1B and GLC6p25 respectively. The primers are used to amplify gene sequences to generate information necessary to compile haplotype profiles. The parameter of the profiles can be used to detect presymptomatic and symptomatic glaucoma. They can also be used to localise, isolate and identify the GLC1B and GLC6p25 loci so that detection of individuals with glaucoma is enhanced. The haplotype analyses also provide means for identification and following of mutant alleles in pedigrees or populations.

Disclosure; Fig

7K-2; 104pp; English

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AAAO9767/
IID AAAO
XX AAAO
XX AAAO
XX AAAO
XX AAAO
XX Prim
XX WO20
XX O9-P
XX C9-P
XX WPI;
XX USAL
XX WPI;
XX WPI;
XX Det;
PT Com;
CC Com;
CC Com;
CC Com;
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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Identification of presymptomatic individuals using the methods allows intervention in the disease process and obviates the impact of inheriting a mutant allele causing disease, by medically disrupting the initiation or progression of the disease
                                               hybridisation. Cytochrome P450 is a group of enzymes located in the endoplasmic reticulum primarily in the liver. Cytochrome P450 (CYP) is involved in the major route of phase I drug metabolism. The polymorphism of these enzymes results in the appearance of different phenotypes with differential capacities to metabolise drugs. The method allows for the detection of a mutation in a CYP nucleotide sequence, where the mutation is known to affect the isoform's ability to metabolise a drug. The method is useful for measuring a patient's ability to metabolise a drug, specifically drugs which are metabolised by cytochrome P450 such as omegrazole, pentaprazole, phenytoin, verapamil, propanolol, tolbutamide, swarfarin, tricyclic antidepressants such as imipramin and anti-malarial
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Primer; cytochrome P450; drug metabolism; omeprazole; pentaprazole; phenytoin; verapamil; propanolol; tolbutamide; S-warfarin; imiprami anti-malarial prodrug; proguanil; tricyclic anti-depressant; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                 Determining the ability of cells to metabolize a drug using complementary to a target sequence immediately adjacent and relation to a defined point mutation of single-stranded DNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAA09767 standard; DNA; 18
                                                                                                                                                                                                                                                 The invention relates to a method for determining the ability of a cell to metabolise a drug. The method comprises using a detection primer complementary to a sequence 5' in relation to a point mutation of single-stranded DNA encoding a cytochrome P450 isoform, and detecting the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Hauzenberger D;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         28-AUG-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           25-AUG-1999;
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                                                                                                                                                                                                                                                                                                                                            28pp; English.
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Pred. No. 1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length 18;
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15' in
encoding
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                                                                                                                               The method
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Query Match

Sequence

18

BP;

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5 C; 5 G; 1.5%;

0 U;

0 Other; DB 1;

BXAXAXB

ABA82331; ABA82331

standard; DNA;

18

ВP

0,

25-JAN-2002

(first

entry)

Zmax1 gene region physical

map preparation

STS

marker #290

Score 14.4; 2 T;

Length

18;

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RESULT 2289
AAF24965
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         RESULT 2290
ABA82331
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                                                                                         Matches
                                                                                                               Query Match
                                                                                                                                                                                           PCR primers AAF24962-65 were used to amplify exon 12 of the human kritl gene. Kritl is a member of the Ras gene family. Mutations in the kritl gene responsible for certain vascular abnormalities. The primers are used to detect mutations in the Kritl gene, specifically those mutations that are associated with presence of cavernomas, for diagnosis. The kritl gene, or its derivatives, are useful in gene therapy for controlling or its derivatives, are useful in gene therapy for controlling or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; krit1 gene; Ras gene; cavernoma; gene therap vascular malformation; dysplasia; angioma; tumour;
                                                                                                                                                                                                                                                                                                      New primers for amplifying diagnosis, particularly by therapy with this gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         30-APR-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAF24965;
                                                                                                                                                                                                                                                                                                                                                                                                                           01-JUL-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   01-JUL-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PCR primer used to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAF24965 standard;
                                                                                                                                       Sequence 18
                                                                                                                                                                                                                                                                                 Claim 1; Page 16; 39pp; French.
                                                                                                                                                                                                                                                                                                                                                                             Tournier LE,
                                                                                                                                                                                                                                                                                                                                                                                                     (INRM ) INSERM INST NAT SANTE & RECH MEDICALE.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 FR2795732-A1
                                                                                                                                                                          dysplasia
                                                                                                                                                                        inhibiting angiogenesis, e.g. in cases of vascular malformation dysplasia, or angioma, and the KritI protein, optionally modifie
                                                                                                     Local
                                                                                                                                                             similarly,
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                                                                                                     Similarity
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                                                                  GGCTGGTCTCGAACTC 224
                                            GGCTGGTCTTGAACTC 16
                                                                                                                                        ВP;
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                                                                                          Conservative
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                                                                                                                                       N
                                                                                                                                                             particularly for treatment of tumours
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  amplify the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         entry)
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                                                                                                     1.5%;
93.8%;
                                                                                                                                        4 C; 6 G;
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                                                                                                                                                                                                                                                                                                                    regions of the KritI detecting mutations,
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                                                                                                     Score 14.4;
Pred. No. 1
                                                                                                                                        6 T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  human krit1
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                                                                                            Mismatches
                                                                                                                                        0 U;
                                                                                                                                                                                                                                                                                                                                                                                Labauge P;
                                                                                                       1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             gene therapy;
                                                                                                                                         0 Other;
                                                                                                                DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  gene
                                                                                                                                                                         optionally modified,
                                                                                                                                                                                                                                                                                                                     gene, useful for cavernomas, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    exon
                                                                                                                Length 18;
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                                                                                            Indels
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             angiogenesis;
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                                                                                                                                                                                                                                                                                                                       gene
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RESULT 2291
AAL49482/c
ID AAL4948
AC AAL4948
AC AAL4948
AC Trisomy
XX Trisomy
XX Trisomy
XX Trisomy
XX DE10055
XX DE10055
XX DE10DEC-
XX ADNA-|
PR 01-DEC-
XX AAL4948
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                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                     The present invention describes the human Zmax1 gene and the high bone mass (IBM) gene, which are found on chromosome 11q13.3. The Zmax1 and HBM genes have osteopathic activities. The genes can be used in gene therapy and in the production of vaccines. They can be used in the diagnosis and treatment of bone disorders including osteoparosis, Paget's disease, sclerostosis, osteomalacia and fibrous dysplasia.

ABA82038 to ABA82700 and AAG68168 to AAG68193 represent sequences used in the exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human; high bone mass; HBM gene; Zmax1 gene; chromosome 11; 11q13.3; sequence tagged site; STS; osteoporosis; osteopathic; gene therapy; antisense therapy; vaccine; bone disorder; Paget; disease; adapter; sclerostosis; osteomalacia; fibrous dysplasia; PCR primer; linker; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
Synthetic.
                                                                                                                                                                                                                                                        AAL49482
                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       modulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New high bone
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05-APR-2000; 2000US-00544398.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    21-JUN-2000; 2000WO-US016951.
                (ADNA-) ADNAGEN AG
                                     01-DEC-2000; 2000DE-01059776
                                                                                     18-JUL-2002
                                                                                                            DE10059776-A1
                                                                                                                                                                                 Trisomy 21 diagnosis kit PCR primer PTR21S1412F.
                                                                                                                                                                                                           22-NOV-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (GENO-) GENOME THERAPEUTICS CORP.
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                                                                                                                                   sapiens
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                                                                                                                                                                                                                                                                                                                                           359
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                                                             -2000; 2000DE-01059776
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Å,
                                                                                                                                                         21;
                                                                                                                                                                                                                                                                                                                                                                             Similarity
                                                                                                                                                                                                                                                        standard;
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                                                                                                                                                                                                                                                                                                                   GCTCAAGCAGTCCTCC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       bone mass
                                                                                                                                                           PCR;
                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                BP; 3
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Little
                                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     mass (HBM)
                                                                                                                                                           primer; prenatal diagnosis;
                                                                                                                                                                                                                                                                                                                                                                                                                A; 4 C; 7
                                                                                                                                                                                                                                                        DNA;
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                                                                                                                                                                                                                                                                                                                                                                                                                G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                             Score 14.4;
Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                   Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       e.g.
                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                            88.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 proteins useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         osteoporosis.
                                                                                                                                                                                                                                                                                                                                                                                        Length 18;
                                                                                                                                                                                                                                                                                                                                                                   Indels
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ABK23128/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Query Match
Best Local Similarity
Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Diagnostic kit pairs specific chromosome 21.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The present invention relates to a diagnostic kit for detecting trisomy 21 in a human foetus, which comprises at least two pairs of oligonucleotide primers suitable for amplification, by polymerase chain reaction (PCR), of both strands of a target DNA sequence, i.e. a short tandem repeat region of human chromosome 21. The kit is used for prenatal, non-invasive diagnosis of trisomy 21. The present sequence is an oligonucleotide suitable for use in the kit of the invention
                                                                                                                                                diagnosing, treating or preventing e.g., a identifying a molecule that binds to high corresponding wild type gene.
                                                                                                                                                                                                                                                                                 WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human; mouse; Zmax1; HBM; high bone mass gene; lipid regulation; stroke; lipid-associated condition; arteriosclerosis; cardiovascular disease; 88; osteoporosis; atherosclerosis; diabetic atherosclerosis; plaque build-up; neurovascular condition; wound healing; gene therapy; PCR primer; probe;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABK23128 standard; DNA; 18 BP
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                                                                                                                                                                                                                                                                                                                                      Carulli
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          06-DEC-2001.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             osteopathic;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 09-APR-2002
                                                                                                   Disclosure; Page 40; 409pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 26-MAY-2000; 2000US-00578900.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    25-MAY-2001; 2001WO-US016946.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   bone development disorder; antiarteriosclerotic; cardiovascular;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABK23128;
                                                                                                                                                                                                      Identifying molecules involved in lipid regulation, useful for diagnosing, treating or preventing e.g., arteriosclerosis, compared to the compared of the comp
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          sapiens.
                                                                                                                                                                                                                                                                                 2002-097784/13.
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                                                                                                                                                                                                                                                                                                                                                                                      GENOME THERAPEUTICS CORP.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Page 6;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             cerebroprotective
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                                                                                                                                                                                                                                                                                                                                      Little
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              reverse PCR primer
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                                                                                                                                                                                                                                                                                                                                      ₽,
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                                                                                                                                                                                                                                                                                                                                                                                      SCHOOL MEDICINE.
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                                                                                                                                                                                                                                                                                                                                      Recker RR,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 #145
                                                                                                                                                                                                                                                                                                                                      Johnson ML;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.9e+03
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                                                                                                                                                                                bone mass
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                                                                                                                                                                              gene
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The invention relates to a method for identifying a molecule involved in lipid regulation comprising identifying a molecule that binds to or inhibits binding of a molecule to high bone mass (HBM) or its wild type

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Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           conditions caused by plaque build-up, poor circulation due to plaque build-up and associated poor wound healing. The methods may be used in gene therapy, pharmaceutical development, and diagnostic assays for bone development disorders. Molecules identified by comparison of Zmax1 and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          HBM systems can be used as surrogate markers in pharmaceutical development, in diagnosis of human or animal bone disease, and in the treatment of bone diseases. Sequences ABK22776 ABK33411 represent cDN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       molecules encoding human Zmaxl and HBM, and PCR primers,
 The present invention describes a method for detecting and differentiating between haematopoletic cell proliferative disorders associated with at least 1 gene and/or their regulatory regions in a subject. The method comprises contacting a target nucleic acid in a biological sample obtained from the subject with at least 1 reagent, which distinguishes between methylated and non-methylated CpG which distributions the target nucleic acid. ABZ09861 to ABZ11118
                                                                                                                                                                     Detecting and differentiating between hematopoietic cell proliferative disorders, comprises contacting a target nucleic acid with a reagent tl distinguishes between methylated and non-methylated CpG dinucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
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                                                                                                                                                                   distinguishes
                                                                                                                                                                                                                                                                                                         Olek A,
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                                                                                                                                                                                                                                                                                                                                                         (EPIG-)
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                                                                                                                                                                                                                                                                                                                                                           EPIGENOMICS
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                                                                                                                                                                                                                                                                                      , Braun A, Distler J, Piepenbrock C, Adorjan Lipscher E, Maier S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                methylation state;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     standard;
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                                                                                                                                     Page
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
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                                                                                                                                     55; 117pp;
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93.8%;
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                                                                                                                                     English.
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Pred. No. 1.9e+03;
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G, Lesche I
Mueller V,
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Otto T,
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RESULT 2294
ACC45711/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              represent specifically claimed nucleotide sequences from the present CC invention. Oligonucleotides from the present invention can be used: for differentiating between healthy haematopoietic cells and proliferative CC disorder haematopoietic cells; for differentiating between acute CC disorder haematopoietic cells; for differentiating between acute CC determining the cytosine methylation state and/or single nucleotide CC polymorphisms (SNPs) of haematopoietic cell proliferation disorder CC related sequences and their complements; and as primers for the amplification of haematopoietic cell proliferation disorder related DNA complements. The nucleotide sequences from the present invention can also be used for detecting a predisposition to, differentiation between Subclasses, diagnosis, prognosis, treatment and/or monitoring of haematopoietic cell proliferative disorders. The present method enables a highly specific classification of haematopoietic cell proliferative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Best Loc
Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; high bone mass; HBM; LRP5; LRP6; transgenic; bone mass mod gene therapy; bone density modulation; bone strength; trabecular bone size; bone tissue connectivity; bone disease; osteoporosis; osteomalacia; rickets; Paget's disease; neoplasm of the bone; pri
                                                                                                                                                                                                                                                            11-MAY-2001; 2001US-0290071P.
17-MAY-2001; 2001US-0291311P.
01-FEB-2002; 2002US-0353058P.
04-WAR-2002; 2002US-0361293P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ACC45711 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    disorders allowing for improved and informed treatment
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  02-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ACC45711;
                                                                                                     New transgenic animals (e.g. mice), useful as models for studying bone density modulation, developing drugs for treating or preventing bone diseases (e.g. osteoporosis), or diagnosing diseases characterized by
                                                                                                                                                                                          Babij P,
                                                                                                                                                                                                                      (GENO-)
                                                                                                                                                                                                                                                                                                                                     13-MAY-2002;
                                                                                                                                                                                                                                                                                                                                                               21-NOV-2002.
                                                                                                                                                                                                                                                                                                                                                                                          WO200292764-A2
                                                                                                                                                                                                                                                                                                                                                                                                                       Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Local
                                                                                                                                                               2003-129278/12
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         220 AACTCCCGACCTCAGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      HBM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     15;
                                                                                                                                                                                                                      GENOME WYETH.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AACTCCCGACCTCAAA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      STS
                                                                                                                                                                                           Bex FJ,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                            density
                                                                                                                                                                                                                                                                                                                                     2002WO-US014876
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first entry
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      marker
                                                                                                                                                                                                                                    THERAPEUTICS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             A; 1 C; 7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DNA;
                                                                                                                                                                                             Yaworsky
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     reverse primer #145.
                                                                603pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           G; 7 T; 0 U;
                                                                                                                                                                                           Pď,
                                                                                                                                                                                                                                      CORP
                                                                 English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Pred. No. 1.90
); Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Score
                                                                                                                                                                                             Bodine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    14.4;
No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    .9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            bone mass modulation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          of patients
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0
                                                                                                                                                                                                                                                                                                                                                                                                                                                    primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                      88
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comprising an alteration an LRP5 that is modulated The invention relates

modulated gene,

mass

(MBM)

to novel transgenic animals expressing expressing the corresponding wild type expressing the corresponding the for LRP6, coon of the gene encoding LRP5 or LRP6, cated by an altered gene control sequence

or

y the high e HBM gene, or expressing ce introduced

Disclosure;

Page

56;

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RESULT 2295
ADA26921/c
ID ADA2692
XX ADA2692
XX ADA2692
XX ADA2692
XX ADA2692
XX Lype I Human P
XX I Human P

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Query Match
Best Local S
Matches 15
The present invention describes a method of modulating type I muscl formation comprising contacting a cell with an agent that modulates alpha expression or activity, so that type I muscle formation is modulated. Also described: (1) a method for identifying a compound capable of modulating type I muscle formation comprising contacting cell with a compound, and determining whether PGC-1 alpha expressions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 immunomodulator; antidepressant; gene therapy;
aberrant type I muscle formation disorder; heart failure; disuse atrophy;
mitochondrial myopathy; systemic metabolic disorder; diabetes; obesity;
                                                                                                                                                                                                                                                                                                     Use of agents that modulate PGC-lalpha expression or activity, for modulating type I muscle formation or treating a disorder associated with aberrant type I muscle formation e.g. heart failure, diabetes or a mitochondrial myopathy.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human PGC-1 alpha promoter CRE sequence SEQ ID NO:15.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO2003068944-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               type I muscle formation; PGC-1 alpha; cardiant; antidiabetic; anorectic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADA26921;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADA26921 standard; cDNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-689670/65.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Spiegelman
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (DAND ) DANA FARBER CANCER INST INC.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   13-FEB-2003; 2003WO-US004792
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     21-AUG-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     l Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           GCTCAAGCAGTCCTCC 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 3 A; 4 C; 7 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                      Fig 1B; 114pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Lin
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 14.4; DB 1;
Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length 18
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                                                                                                                                        modulates PGC-1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0;
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ormation comprising contacting a whether PGC-1 alpha expression

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Use of agents that modulate PGC-lalpha expression or activity, for

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RESULT 2296
ADA26920/c
ID ADA2692
CC treating a disorder associated with aberrant type I muscle formation
CC comprising assaying the ability of the compound to modulate the
CC expression or activity of PGC-1 alpha; (3) compounds identified by the
CC method of (1) or (2); (4) a method for treating a subject having a
CC disorder associated with aberrant type I muscle formation comprising
CC administering to the subject an agent capable of modulating PGC-1 alpha
CC expression or activity; (5) a method for increasing type I muscle
CC compation in a subject comprising administering to the subject an agent
CC expression or activity; (5) a method for increasing type I muscle
CC expression or activity; (5) a method for increasing type I muscle
CC expression or activity; (5) a method for increasing type I muscle
CC expressed in the skeletal muscle of the animal. Expression vectors and
CC expressed in the skeletal muscle of the animal. Expression vectors and
CC expressed in the skeletal muscle of the animal. Expression vectors and
CC expressed in the pGC-1 alpha polypeptides, are also described. PGC-1
CC alpha has cardiant, antidabetic, anorectic, immunomodulator and
CC antidepressant activities, and can be used in gene therapy. The agents
CC modulating type I muscle formation or treating a disorder associated with
CC aberrant type I muscle formation or treating adisorder such as
CC diabetes, obesity, cachexia or anorexia. The PGC-1 alpha nucleic acid
CC molecules, polypeptides, antibodies and modulators are useful in drug
CC screening assays or in gene therapy. The transgenic animals are useful in
CC to molecules, polypeptides, antibodies and modulators are useful in the
CC involved with type I muscle formation. The presents sequence represents a
CC diabetes, polypeptides, antibodies and modulators are useful in the
CC modulating assays of the promoter of the semigence which is used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  片
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches 15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                         immunomodulator; antidepressant; gene therapy; aberrant type I muscle formation disorder; heart fail mitochondrial myopathy; systemic metabolic disorder;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 18 BP; 4 A; 2 C; 7 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                     WO2003068944-A2
                                                                                                                                                                                                                                                                                                                                                Mus musculus.
                                                                                                                                                                                                                                                                                                                                                                                       cachexia; anorexia; mouse; promoter; ds
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  20-NOV-2003 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ADA26920 standard; cDNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  human PGC-1 alpha promoter CRE nucleotide sequence, exemplification of the present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         activity is modulated; (2) a method for identifying a compound capable of
                                      WPI; 2003-689670/65
                                                                                                                                                                    13-FEB-2002; 2002US-0357069F
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            type I muscle formation; PGC-1 alpha;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Mouse PGC-1 alpha promoter CRE sequence SEQ ID NO:14
                                                                                                                                                                                                               13-FEB-2003; 2003WO-US004792
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1122 САЛАСТССТВАССТСА 1137
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  18
                                                                                                                            DANA FARBER CANCER INST INC
                                                                                   ВМ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                 Lin J;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            cardiant; antidiabetic; anorectic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.9e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                               heart failure; disuse atrophy;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                                                                                                                                                                               diabetes;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
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CC capable of modulating type I muscle formation comprising a compound capable of modulating type I muscle formation comprising a compound capable of cell with a compound, and determining whether RGC-1 alpha expression or comprising associated with aberrant type I muscle formation comprising assaying the ability of the compound identified by the comprising associated with aberrant type I muscle formation comprising associated with aberrant type I muscle formation comprising a subject having a compound of (1) or (2); (4) a method for treating a subject having a compound of (1) or (2); (4) a method for treating a subject naving a compound comprising a compound of (1) or (2); (4) a method for increasing type I muscle formation comprising a compound of compound of (1) or compound in a subject comprising administering to the subject an agent capable of increasing type I muscle formation or activity; (5) a method for increasing type I muscle comprising an exogenous pGC-1 alpha nucleic acid molecule, where the exogenous pGC-1 alpha nucleic acid molecule is cells comprising the pGC-1 alpha nucleic acid molecule is cells comprising the pGC-1 alpha nucleic acid molecule is cells comprising the pGC-1 alpha nucleic acids, and antibodies that specifically bind pGC-1 alpha polypeptides, are also described. pGC-1 alpha has cardiant, antidiabetic, anorectic, immunomodulator and compound that proper in muscle formation or treating a disorder associated with aberrant type I muscle formation or treating a disorder such as compound with type I muscle formation. The present sequence represents a mouse pgC-1 alpha promoter CRE nucleotide sequence, which is used in the excreening assays or in gene therapy. The transgenic animals are useful in drug screening assays or in gene therapy. The transgenic animals are useful in consult in the properties of the present invention.

CC intolecules, polypeptides, antibodies and modulators are useful in drug screening assays or in gene therapy. The transgenic animals are useful in the properties 
THE STANDARD STANDARD
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           RESULT 2297
ADB98409/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          В
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            modulating type I muscle aberrant type I muscle mitochondrial myopathy.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present invention describes a method of modulating type I musci-
formation comprising contacting a cell with an agent that modulates
alpha expression or activity, so that type I muscle formation is
modulated. Also described: (1) a method for identifying a compound
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Disclosure; Fig 1B; 114pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                                                                                                                                                                                                    Osteopathic;
                                                                                                                                                                                                                                                                                                                                                                                    Sequence tagged
                                                                                                                                                                                                                                                                                                                                                                                                                                                    04-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADB98409;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ADB98409
                              13-MAY-2002; 2002WO-US014877.
                                                                                                 21-NOV-2002.
                                                                                                                                                             WO200292000-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1122
                                                                                                                                                                                                                                                                                         mass modulation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         CAAACTCCTGACCTCA 1137
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 CAAACTCCTGACGTCA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             type I muscle formation
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BP; 4
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Conservative
                                                                                                                                                                                                                                                                                                                        Gene therapy; High Bone Mass; HBM; LRP5; Zmax1; LRP6;
                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
                                                                                                                                                                                                                                                                                                                                                                                    site
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             muscle formation or treating a disorder associated with uscle formation e.g. heart failure, diabetes or a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         2 C; 7
                                                                                                                                                                                                                                                                                                                                                                                    #290 used
                                                                                                                                                                                                                                                                                         osteoporosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 14.4; DB 1;
Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                 to prepare Zmax1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                                                                                         STS;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     of modulating ty
                                                                                                                                                                                                                                                                                         sequence tagged site;
                                                                                                                                                                                                                                                                                                                                                                                       (LRP5)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        type I muscle
hat modulates
                                                                                                                                                                                                                                                                                                                                                                                       gene region
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               PGC-1
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ACA58053/c
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         The present invention relates to High Bone Mass (HBM), LRP5 (Zmax1) and LRP6 mutants, which results in a HBM-like phenotype when expressed in a cell. The HBM-like phenotype results in bone mass modulation and/or lipid level modulation. The invention is useful for diagnosing a HBM-like phenotype in a subject and for preparing a composition for modulating bone mass and/or lipid levels in a subject suffering from e.g. osteoporosis. The present sequence is a Sequence Tagged Site (STS) marker, which was used to prepare a physical map of the Zmax1 (LRP5) gene region.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New nucleic acid comprising a mutation in LRP5 or diagnosing a HBM-like phenotype in a subject and composition for modulating bone mass and/or lipid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       11-MAY-2001; 2001US-0290071P.
17-MAY-2001; 2001US-0291311P.
01-FEB-2002; 2002US-0353058P.
04-MAR-2002; 2002US-0361293P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Allen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (AMHP
                                                                                                                                                                                                                                    Human; genotype determination; familial bipolar affective disorder; chromosomal region linked; locus associated with resistance; D4S402; D4S424; D4S431; D4S404; D1IS394; D1IS29; chromosome marker; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Example 2;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              suffering from e.g. osteoporosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WPI; 2003-129214/12
                                                                                                     29-MAR-1996;
20-OCT-1997;
                                                                                                                                                                                        US2002192655-A1.
                                                                                                                                                                                                                                                                                 Human familial
                                                                                                                                                                                                                                                                                                          09-JUN-2003
                                                                                                                                                                                                                                                                                                                                                        ACA58053 standard; DNA; 18 BP
                       Ginns EI,
                                                                                                                                         13-JUN-2001; 2001US-00881012
                                                                                                                                                                19-DEC-2002.
                                                                                                                                                                                                              Homo sapiens
                                                                                                                                                                                                                                                                                                                                 ACA58053;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (GENO-)
                                             (GINN/) GINNS E I.
(EGEL/) EGELAND J A.
(PAUL/) PAUL S M.
                                                                                            19-OCT-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                        359
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      GENOME WYETH.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                   GCTCAAGCAGTCCTCC
                                                                                                                                                                                                                                                                                                                                                                                                                                          GCTCAAGCAGTCCACC 374
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Anisowicz
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Page 63; 629pp; English.
                       Egeland JA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                            96US-0014334P.
97US-0062924P.
98US-00175158.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 THERAPEUTICS
                                                                                                                                                                                                                                                                                 bipolar
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             3 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             4 C; 7
                                                                                                                                                                                                                                                                                    affective disorder chromsome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Graham
                         Paul SM;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    CORP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              G; 4 T; 0 U;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 14.4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ДŖ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Morales
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Þ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        P5 or LRP6, useful and for preparing
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Yaworsky
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           for preparing levels in a s
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Indels
                                                                                                                                                                                                                                                                                      marker
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   PJ,
                                                                                                                                                                                                                                                                                      primer
                                                                                                                                                                                                                                        primer; ss
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Liu
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             subject
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Gaps
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WPI; 2003-352708/33

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           associated with resistance to bipolar affective disorder, where the Chromosomal regions are included of and localised between D4S402 and D4S404, Or D18394 and D1829. The invention also discloses a kit for determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder, where the kit comprises markers for two or more of the chromosomal regions cited. The method and kit are useful for determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder in a family affected by bipolar affective disorder, for determining the contribution of these chromosomal regions to bipolar affective disorder in an affective family member, and for assessing an increased or decreased arisk of developing bipolar illness for a tested individual from an affected family. ACA58053-ACA58292 represent primers used in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder in a family comprises determining the genotype of e.g., chromosomal regions D4S402 and D4S424.
                              New isolated polynucleotides comprising single nucleotide polymorphisms of the cardiovascular gene, useful for assessing predisposition or susceptibility to a cardiovascular disease, e.g. atheroscierosis,
                                                                                                                                                                                                                                                                                                                                                                                                                           SNP; single nucleotide polymorphism; cardiovascular associated gene; allelic variation; atherosclerosis; ischemia; reperfusion; hypertens restenosis; arterial inflammation; myocardial infarction; stroke; pr
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention relates to a method of determining a genotype associated with increased or decreased resistance to familial bipolar affective disorder. The method comprises determining the genotype with least one marker of at least one chromosomal region linked to a locus
               susceptibility to a cardiovascular disease, e.g. restenosis or stroke.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 8; 79pp; English.
                                                                                                            WPI; 2003-577532/54
                                                                                                                                              Stropp
                                                                                                                                                                                                                      08-JAN-2002; 2002EP-00000153
                                                                                                                                                                                                                                                           07-JAN-2003; 2003WO-EP000060
                                                                                                                                                                                                                                                                                                 17-JUL-2003
                                                                                                                                                                                                                                                                                                                                    WO2003057911-A2
                                                                                                                                                                                                                                                                                                                                                                       Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SNP-containing cardiovascular associated gene primer #162
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           03-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ADM92832;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADM92832 standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 18 BP; 3 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 present invention
                                                                                                                                                                                   (FARB ) BAYER
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                639
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   l Similarity
15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                GTCACCCAGGCTGGAG 654
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           GTGACCCAGGCTGGAG
                                                                                                                                              Schwers S,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                           atherosclerosis; ischemia; reperfusion; hypertension; al inflammation; myocardial infarction; stroke; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            7 C; 4 G; 4 T; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      93.8%;
                                                                                                                                              Kallabis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ВÞ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Score 14.4; DB 1;
Pred. No. 1.9e+03;
                                                                                                                                              Ή;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 18,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Indels
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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The invention relates an isolated polynucleotide (I) encoded by a cardiovascular associated (CA) gene, having allelic variation contained in a functional surrounding like full length cDNA for CA gene polypeptide, and with or without the CA gene promoter sequence. (I) is a polynucleotide comprising single nucleotide polymorphisms predicting cardiovascular disease. The polynucleotides are useful for assessing predisposition or susceptibility to a cardiovascular disease, e.g. atherosclerosis, ischemia/reperfusion, hypertension, restenosis, arterial inflammation, myocardial infarction, and stroke. These may also be used to predict personal medication schemes omitting adverse drug reactions, or as probes for detecting genetic polymorphisms and as templates for the recombinant production of normal or variant peptides/polypeptides encoded by the genes. This sequence corresponds to a PCR primer to amplify one of
                                                                                                                                                                                                                                                                                                                                                                                                                                   high
                                                                                                                                                                                                                                                                                                                                                                                                                                               acute coronary syndrome; antiatherosclerotic; cardiant; antianginal; leukotriene biosynthesis inhibitor; leukotriene receptor antagonist; 5-lipoxygenase activating protein; FLAP; human; chromosome 13; chromosome 13q12; polymorphism; 5-lipoxygenase gene promoter; 5-LO gene promoter; diabetes; hypertension; hypercholesterolaemia; obesity; inflammatory marker; low density lipoprotein; cholesterol; cholesterol;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    by the genes. This sequence the genes of the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Disclosure; Page 72; 187pp; English.
                                                          Use of leukotriene synthesis for treatment for myocardial infarction in individual.
                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens
Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human FLAP related microsatellite marker SEQ ID NO:234.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADN06584;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADN06584 standard; DNA; 18
                                                                                                                                                         Helgadottir A,
                                                                                                                                                                                                                        17-OCT-2002; 2002US-0419433P.
21-FEB-2003; 2003US-0449331P.
                                                                                                                                                                                                                                                                                                        29-APR-2004.
                                                                                                                                                                                                                                                                                                                                      WO2004035741-A2
                                                                                                                                                                                                                                                                        16-OCT-2003; 2003WO-US032556.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                15-JUL-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 leukotriene synthesis inhibitor; myocardial infarction;
                                                                                                                           2004-357211/33.
                                                                                                                                                                                                                                                                                                                                                                                                                                   density
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          387 CCAAAGTGCTGGGATT 402
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                                                                                                                                                                                          DECODE GENETICS
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 4 A; 2 C; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                   lipoprotein; angina;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (first entry)
                                                                                                                                                          Gurney ME, Gulcher JR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              17
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                                                                            inhibitor for infarction or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 14.4;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         6 T; 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                   density lipoprotein; cholesterol atherosclerosis; microsatellite
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.9e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                            manufacture of susceptibility
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Indels
                                                                            a medicament
to myocardial
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                     marker;
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The present invention describes using a leukotriene synthesis inhibitor

Disclosure;

SEQ ID NO 234; 306pp; English.

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CC treatment of myocardial infarction or susceptibility to myocardial from the maintaneous of treatment of myocardial infarction, an at-risk haplotype for myocardial infarction, an at-risk haplotype in CC an at-risk haplotype for myocardial infarction, an at-risk haplotype in CC the 5-lipoxygenase activating protein (FIAP) gene, a polymorphism in a CC FIAP nucleic acid and an at-risk polymorphism in the 5-lipoxygenase (5-CC lo) gene promoter; in an individual who has at least one risk factor CC chosen from diabetes; hypertension, hypercholesterolaemia, elevated CC lp(a), obesity, past or current smoker; in an individual having elevated CC lp(a), obesity, past or current smoker; in an individual having elevated CC inflammatory marker chosen from C-reactive protein (CRP), serum amyloid CC inflammatory marker chosen from C-reactive protein individual having increased leukotriene metabolite, interleukin-6, tissue metalloprotease type-1, matrix metalloprotease type-2; in an cC individual having increased leukotriene synthesis; in an individual who has atherosclerosis or who event, stable angina, non-ST-elevation myocardial infarction (NSTEMI) is useful for treation and procardial infarction myocardial infarction (NSTEMI) and ST-elevation myocardial infarction in the exemplif
RESULT 2301
AD056531/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        antiatherosclerotic, cardiant and antianginal activities, and can be used as a leukotriene biosynthesis inhibitor, and a leukotriene receptor antagonist. (I) can be use for the manufacture of a medicament for the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (I) for the manufacture of a medicament for the treatment of myocardial infarction or susceptibility to myocardial infarction in an individual. Also described is a method (M1) for the treatment of acute coronary syndrome (ACS) in an individual comprising administering (I). (I) has
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          present invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human cyclin-dependent kinase 10, CDK10 proximal SNP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ADO56531;
                                                                                                                                                                                     06-NOV-2003; 2003WO-US035879.
                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                single nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                                            melanoma associated
                                                                                                                                                                                                                                                                                                                                                                                                                                                     gene therapy; human; ss; melanoma; •
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ADO56531 standard;
Roth RB,
                                                                                                         06-NOV-2002;
23-JUL-2003;
                                                                                                                                                                                                                                          27-MAY-2004
                                                                                                                                                                                                                                                                                         WO2004044164-A2
                                                  (SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           282 CACCATGCCCGGCTCT 297
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 l Similarity
15; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1 CACCATGCCTGGCTCT 16
                                                  SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        18
Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
                                                                                                       2002US-0424475P.
2003US-0489703P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ₽,
                                                                                                                                                                                                                                                                                                                                                                                                polymorphism; cyclin-dependent
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                            polymorphic variation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        7 C; 3
  Braun A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        G; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Score 14.4;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mismatches
     Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.9e+03;
     SX.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                               SNP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                      kinase
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          probe
                                                                                                                                                                                                                                                                                                                                                                                                      10;
                                                                                                                                                                                                                                                                                                                                                                                                      CDK10;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
                                                                                                                                                                                                                                                                                                                                                                                                   probe
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RESULT 2302
AD056506/c
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Best Local S
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cyclin-dependent kinase 10, CDK10, proximal SNP probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The invention relates to a method of identifying a subject at risk of melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample polymorphic variations
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Example 5; Page 84; 295pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2004-411721/38
                                                                         Identifying a subject at risk of melanoma, useful for treating melanoma, comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                     gene therapy; human; ss; melanoma;
melanoma associated polymorphic variation; SNP;
single nucleotide polymorphism; cyclin-dependent kinase 10; CDK10; probe
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human cyclin-dependent kinase 10, CDK10 proximal SNP probe #31
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 18
                                                                                                                                       WPI; 2004-411721/38.
                                                                                                                                                                  Roth RB,
                                                                                                                                                                                                                               06-NOV-2002; 2002US-0424475P.
23-JUL-2003; 2003US-0489703P.
                                                                                                                                                                                                                                                                            06-NOV-2003; 2003WO-US035879
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                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    AD056506
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ADO56506 standard; DNA; 18
                                                                                                                                                                                                                                                                                                              27-MAY-2004.
                                                                                                                                                                                                   (SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1092 GGGGTTTCACCATATT 1107
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Similarity
                                                                                                                                                                                                   SEQUENOM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GGGGTTTCACCATGTT
                                                                                                                                                                    Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        BP; 6
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        A; 6 C; 3 G; 2 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.5%;
93.8%;
                                                                                                                                                                      Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            0
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Pred. No. 1.90
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Score 14.4;
                                                                                                                                                                       Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            1.9e+03
                                                                                                                                                                       MS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Length 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               <u>.</u>
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The invention relates to a method of identifying a subject at risk of

Example 5; Page 84; 295pp; English

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Query Match
Best Local S
Matches 15
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from a subject. Preventing melanoma in a subject comprises detecting the presence or absence of one or more polymorphic variations associated we melanoma in a nucleic acid sample from a subject; and administering a melanoma preventative to a subject in need thereof based upon the presence or absence of the one or more polymorphic variations in the nucleic acid sample. The preventative reduces ultraviolet (UV) light exposure to the subject. The methods, nucleic acids, proteins, and compositions are useful for treating melanoma. The present sequence represents a human cyclin-dependent kinase 10, CDK10, proximal SNP processing the contraction of the cont
                                                                                                                                                                                                                                                                          The invention relates to a method of identifying a subject at risk of melanoma comprising detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Identifying a subject at risk of melanoma, useful for treating melanoma. comprises detecting the presence or absence of one or more polymorphic variations associated with melanoma in a nucleic acid sample from a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                06-NOV-2002; 2002US-0424475P
23-JUL-2003; 2003US-0489703P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   gene therapy; human; ss; melanoma; melanoma associated polymorphic va
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AD056556
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        06-NOV-2003; 2003WO-US035879
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       27-MAY-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    single
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Human cyclin-dependent kinase 10,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      12-AUG-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              ADO56556 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2004-411721/38
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       492 GATCACAGCTCACTGC 507
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              16
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       nucleotide
                                                                                                                                                                                                                                                                                                                                                                                                        <u>ت</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                     Page
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 3 A; 3 C; 8
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                        85;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ed polymorphic variation; SNP;
polymorphism; cyclin-dependent kinase 10; CDK10; probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                     295pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 _
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Ą
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 14.4; DB 1;
Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           CDK10 proximal SNP probe #81
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               SM
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Length 18;
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                                                                                                                                                                                                                     with
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probe

Query Match
Best Local Similarity
Matches 15; Conserv

Conservative

93.8%;

Pred. No. 1.96 0; Mismatches

.9e+03

DB 1; 1;

Length 18;

Indels

0

Gaps

0

Score 14.4; Pred. No. 1

Sequence 18 BP;

5 A;

5 C; 7

G; 1 T; 0 U; 0 Other;

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Matches
                               of breast cancer comprising detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a subject at risk of breast cancer, for early diagnosis, prevention and treatment of breast cancer, possibly via gene therapy, as well as to analyse and predict a response to a breast cancer treatment and in clinical drug trials. The current sequence is that of an Extend primer (also described as probe) of the invention which was used to genotype human intercellular adhesion molecule ICAM-1/ICAM-4/ICAM-5 gDNA. ICAM-1 (human rhinovirus receptor; BB2; CD54; cell surface glycoprotein p3.58) has been mapped to chromosomal position 19p13.2, ICAM-6 (landsteiner-Wiener blood group; LW) has been mapped to chromosomal position 19p13.2-cen and ICAM-5 (telencephalin) has been mapped to chromosomal position 19p13.2-cen and ICAM-5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Sequence 18 BP; 5 A; 2 C; 6 G; 4 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                       of polymorphic variations in the ICAM, MAPK10, KIAA0861, NUMA1 or GALE regions which are associated with breast cancer in a nucleic acid sample
                                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2004-441051/41.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           25-NOV-2002;
24-JUL-2003;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               10-JUN-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             intercellular adhesion molecule; ICAM-1; human rhinovirus receptor; BB2; CD54; cell surface glycoprotein p3.58; ICAM-5; the color blood group; ICAM-5; telencephalin; chromosome 19p13; Bandateiner-Wiener blood group; ICAM-5; telencephalin; chromosome 19p13; ss; primer; PCR; SNP; single nucleotide polymorphism; probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 breast cancer; cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Extend primer
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  26-AUG-2004 (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADP45830;
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                                                                                                                                                                                                                                                                                                     Example 4; Page 83; 289pp; English
                                                                                                                                                                                                                                                                                                                                                                          Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the ICAM, MAPK10, KIAA0861, NUMA1 or GALE
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Roth RB,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-NOV-2003; 2003WO-US037948
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WO2004047623-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (SEQU-)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   l Similarity
15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      \vdash
                                                                                                                                                                                                                                                                                                                                         subject.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              SEQUENOM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    standard; DNA; 18
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        GATTACAGGTGTGAGC 16
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             2002US-0429136P.
2003US-0490234P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ; cyrostatic; gene therapy; human; adhesion molecule; ICAM-1; human
                                                                                                                                                                                                                                                                         relates to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 22 used to genotype human ICAM-1/ICAM-4/ICAM-5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   1.5%;
93.8%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Braun
                                                                                                                                                                                                                                                                         a novel method for identifying a subject at
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0;
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Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                              Kammerer
                                                                                                                                                                                                                                                                                                                                                                                                                                                              SM,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        .9e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                              Reneland
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 18
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RESULT 2305
AAH91142
ID AAH9114
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AAV39596/c
ID AAV395
XX
AC AAV395
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                                                 RESULT 2306
                                                                                                                                              Query Match
Best Local
                                                                                                                                    Matches
                                                                                                                                                                                                      The present invention describes a method for detecting the presence polymorphisms associated with inflammatory bowel diseases such as ulcerative colitis and Crohn's disease. The methods can be used to othe presence of genetic polymorphisms associated with inflammatory k disease and correlating their occurrence with disease states. They used in this way for phenotypic correlations, forensics, paternity testing, medicine and genetic analysis. The present sequence is a polymorphic site described in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           09-OCT-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAH91142
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAH91142 standard;
                                                                                                                                                                                                                                                                                                                                            Testing for the presence of polymorphisms associated with bowel disease, using a hybridization assay.
                                                                                                                                                                                                                                                                                                                                                                                  WPI; 2001-367874/38.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                  10-DEC-1999; 99US-0170257P.
10-APR-2000; 2000US-0196046P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      11-DEC-2000; 2000WO-US033632
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO200142511-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               single
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human inflammatory bowel disease associated polymorphic
                                                                                                                                                                                                                                                                                                                      Claim 1; Page 48; 463pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                (WHED )
                                                                                                                                                                                  Sequence 36 BP; 5
                          AAV39596 standard; cDNA; 14
                                                                                                            1032
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            inflammatory bowel disease; Crohn's disease; ulcerative colitis; nucleotide polymorphism; SNP; chromosome 19p13; paternity test;
                                                                                      _
                                                                                                                                                                                                                                                                                                                                                                                                                              WHITEHEAD INST BIOMEDICAL ELLIPSIS BIOTHERAPEUTICS
                                                                                                                                              Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                         Hudson TJ,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AGCTGGGACCACAGGC
                                                                                                            AGCTGGGATTACGGGCACCTGCCACCACACCCCGCT 1067
                                                                                      AGCCGGGCGTGGTGGCAGNTGCCTGTAATCCCAGCT 36
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                                                                                                                                    Conservative
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               /note=
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           DNA;
                                                                                                                                              1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                          Lander ES,
                                                                                                                                                                                  10 C; 13 G; 7 T; 0 U; 1 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        a
"SNP, optionally G or T at this position"
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                          ВP
                                                                                                                                    0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 sm; SNP; chromosome 19p13; paternity test;
test; gene therapy; ds.
                                                                                                                                 Score 14.2; DB 1;
Pred. No. 2.3e+03;
0; Mismatches 14;
                                                                                                                                                                                                                                                                                                                                                                                                          Rioux J,
                                                                                                                                                                                                                                                                                                                                                                                                                                  CORP.
                                                                                                                                                                                                                                                                                                                                                                                                                                              RES.
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                                                                                                                                     14;
                                                                                                                                                           Length 36;
                                                                                                                                     Indels
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                                                                                                                                                                                                                                                                                                                                                            inflammatory
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                                                                                                                                     Gaps
                                                                                                                                                                                                                                                may be
                                                                                                                                                                                                                                                                        detect
                                                                                                                                                                                                                                                             bowel
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AAV39596;

AAA23392 ID AAA

AAA23392 standard; RNA; 14

RESULT 2307

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                                                                                                                                       CC anearbity and heredity, Particular applications are diagnosts of comparishing at comparishing comparishing at least two comparishes. (i) generating at least two comparishes (ii) generating at least two comparishes (iv) from the target nucleic acid; and (ii) analysing F by mass comparishes (iii) analysing F by mass comparishes (iv) from the sequences in AAV39483 to AAV39592 are specifically compared primers for use in the mass spectrometric analysis of the above process. The process is used to detect genetic diseases (e.g. comparishing that the process and many others) or chromosomal abnormalities (id) from the process and many others) or chromosomal abnormalities (id) from the process and cancers; also for establishing comparishility and heredity. Particular applications are diagnosis of the process and comparishility, and in genetic fingerprinting. Compared with known methods using MS, this process requires fewer specific reagents and is better suited to automation. Extended primers are shorter; primer compared simultaneously. The present sequence represent an oligonucleotide used in an example from the present invention
                                                       Query Match
Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     06-NOV-1996;
06-NOV-1996;
06-NOV-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Mass spectrometry; genetic disease; cl
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequencing nucleic acid by mass spectrometric analysis - for detec nucleic acids, telomerase activity, oncogene mutations, or cancer-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                pathogenic organism; telomerase activity; oncogene mutation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Microsatellite analysis detection primer SEQ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WPI; 1998-286975/25.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Braun
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Koster H,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              08-OCT-1997;
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19-SEP-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                06-NOV-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           14-MAY-1998.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cancer-specific
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      28-SEP-1998
                                                                                                                Sequence 14
                                                                                                                                                                                                                                                                                                                                                                                                                 Example 11; Page 130; 478pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                            specific sequences, for diagnosis of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Lough
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (SEQU-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        23-JAN-1997;
                        620 GAGACAGAGTCTCA 633
 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SEQUENOM INC.
                                                                        Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tang K, Fu D,
Damhoffer-Demar
                                                       1.4%; Score 14; larity 100.0%; Pred. No. Conservative 0; Mismatc
                                                                                                                BP; 2
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97US-00787639.
97US-00933792.
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96US-00744590.
96US-00746036.
96US-00746055.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 chromosomal abnormality;
                                                                                                                A; 4 C;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                diagnosis;
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G;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Siegert CW,
B, Jurinke C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    detection; biological sample; infection;
abnormality; identification; heredity;
                                                                                                                  5 T; 0 U; 0 Other;
                                                       red. No. 1.7e+03;
Mismatches 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                   disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Little DP, Hig
, Van Den Boom
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ID NO:39
                                                                                      Length 14;
                                                             Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Higgins
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                for detecting
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Xiang
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                                                          Gaps
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AAA23392;

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                                                                                                                                                                                                                    CC cleaving activity, which specifically cleave RNA encoded by an arying activity, which specifically cleave RNA encoded by an arying eneman integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17623 to AAA17864 represent their corresponding target sequences; AAA17865 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA18385 and AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19154 represent ribozyme sequences for Tie-2, and AAA18385 and AAA19086 and AAA19155 to AAA19155 to AAA19322 represent their corresponding target sequences; AAA191223 to AAA20361 and AAA21591 to AAA21595 represent ribozyme sequences; AAA21596 to AAA21598 represent their corresponding target sequences; AAA21596 to AAA21688 represent their corresponding target sequences; AAA21596 to AAA22168 represent their corresponding target sequences; AAA21596 to AAA22168 represent their corresponding target sequences; CC AAA23422 represent theta 3, and AAA22376 to AAA23342 to AAA23434 to AAA23422 represent their corresponding target sequences of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding anglogenic factor, especially ARNT, Tie-2. They are capecially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, and other syndrome, Kippel-Trenaunay-Reber syndrome, Osler-Weber-Rendu syndrome, and other syndrome, integrin subunit beta-3, integrin subunit beta-3, integrin subunit alpha-6, or Tie-2.
                                                                                Query Match
Best Local S
Matches 11
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      27-MAR-1998;
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                                                                                                                                                              Sequence 14 BP; 1 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               24-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Integrin subunit beta 3 target site SEQ ID NO:6618
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                                       535
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ribozymes for modulating the synthesis, expression and/or stability mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      PA,
                                                                                11;
                                                                                                   Similarity
cuccueccucaecc 14
                                    CTCCTGCCTCAGCC 548
                                                                                                                                                                                                       subunit alpha-6, or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              encoding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               invention describes enzymatic nucleic acid molecules with RNA
                                                                                Conservative
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Query Match Best Local Similarity

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AAA23382
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                         AAA23422 represent their corresponding target sequences. The ribozymes (the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as meovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                   corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and AAA21596 to AAA21689 represent their corresponding target sequences; AAA21689 to AAA22475 and AAA23233 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA2343 to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention describes enzymatic nucleic acid molecules with RN cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their
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tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
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CC cleaving activity, which specifically gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AnAl7167 and AAAl7561 to AAAl7622 represent ribozyme sequences for ARNT, CC and AAAl7167 and AAAl7560 and AAAl7623 to AAAl7684 represent their corresponding target sequences; AAAl7685 to AAAl8385 and AAAl9087 to AAAl9154 represent ribozyme sequences; AAAl7685 to AAAl9385 and AAAl9087 to AAAl9154 represent ribozyme sequences for Tie-2, and AAAl8386 to AAAl9086 cC aAAl9155 to AAAl9222 represent their corresponding target sequences; AAAl7685 to AAAl9385 and AAAl9086 cC aAAl9155 to AAAl9222 represent their corresponding target sequences; AAAl9232 to AAAl9386 represent their corresponding target sequences; CC aAAl9233 to AAA20361 and AAAl9315 to AAAl9322 represent their corresponding target sequences; CC aAA2l689 to AAA21475 and AAA23363 to AAA23342 represent their corresponding target sequences; CC aAA21689 to AAA22475 and AAA23363 to AAA23342 represent their corresponding target sequences; CC aAA21422 represent their corresponding target sequences; CC aAA23422 represent their corresponding target sequences; CC aAA23422 represent their corresponding target sequences. The ribozyme sequence corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA23422 represent their corresponding target sequences. The ribozyme of CC aAA2342 represent their corresponding target sequences. The ribozyme of CC aAA2342 represent their corresponding target sequences. The ribozyme of CC aAA2342 represent their corresponding target sequences. The ribozyme of CC aAA2342 represent their corresponding 
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RESULT 2:
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CC hydrocarbon nuclear transporter (ARNT) gene, an integrin albha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17623 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to AAA19154 represent tribozyme sequences for Tie-2, and AAA19087 to AAA19154 represent tribozyme sequences for Tie-2, and AAA19086 cand AAA191522 represent their corresponding target sequences; CC AAA19223 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA21681 represent their corresponding target sequences; CC AAA21689 to AAA21688 represent their corresponding target sequences; CC CAA21596 to AAA21688 represent their corresponding target sequences; CC CAA21689 to AAA22475 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23622, AAA23343 to CC CC corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC contegrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related cancular degeneration (ARMD), inflammation, and arthritis, as well as
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 14 BP; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAA23388 standard; RNA; 14
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                                                                                                                                                                                                                                                                                                                                              The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl
                                                                                                                                                                                                                                                                                                                                                                                                          Claim 54; Page 275; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 1999-591315/50
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                                                                                                                                                                                                                                                                                                                                                                                                                                                  ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
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100.0%; Fr
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                        expression and/or stability
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Mcswiggen JA;
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RESULT 2311
ACA62884
       CC desired nucleic acid (NA) that contains multiple repeats of a contains multiple repeats of a contains and the desired NA in which cc providing a treated sample that may contain the desired NA in which cc providing a treated sample that may contain the desired NA in which cc several predetermined repeating NA target sequences are hybridised with a CC NA probe, analysing for presence of hybridised NA containing the NA cc probe, and thereby the presence of hybridised NA containing the NA cc is useful for determining the presence or absence of desired NA. The method cc acids that contain multiple repeats of a predetermined NA target cc sequence, in a NA sample obtained from a biological sample, where the cc repeated sequence includes several predetermined repeated sequence that cd iffer in length and/or sequence. The methods can be efficiently used for cd istinguishing human and bacterial NA. The method is highly sensitive, cc and enables detection and quantification of the presence of a NA without the need to undergo a NA target sequence enrichment step prior to a NA contains multiple repeats of a NA target sequence. This calculate detection of the need to that contains multiple repeats of a NA target sequence. This
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Best Local S
Matches 12
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          neovascular glaucoma, myopic degeneration,
                                                                                                                                                                                                                                                                                                                                                                                       Determining presence or absence of desired nucleic acids that contain multiple repeats of predetermined nucleic acid target sequences in a sample, by using nucleic acid hybridization methods.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Repeated nucleic acid detection method, human probe Alu12S
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25-AUG-1999;
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                                                                                                                                                                                                                                                                                                                   The invention describes a method of determining presence or absence of
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (MAND/)
(TERE/)
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SHULTZ
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  BP; 3 A; 8 C; 1 G; 0 T; 2 U; 0 Other;
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                                                                                                                                                                                                                                                                                                                                                      27; 31pp;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Tereba A,
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99US-00383316.
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                                                                                                                                                                                                                                                                                                                                                        English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Shultz JW;
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RESULT 2312
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                                                                                                     The invention relates to a kit for diagnosing and treating T-cell associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, VbetaRNA or CDNA. The kit is useful for diagnosing organ transplant rejection and diagnosing and treating T-cell associated diseases including autoimmune diseases, degenerative nervous system diseases, graft versus host disease, hypersensitivity diseases, infectious disease, and neoplastic diseases. Autoimmune diseases include Addison's disease, and neoplastic diseases. Autoimmune diseases include Addison's disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease; haddison's disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; alzheimer's disease; hypersensitivity disease; type I hypersensitivity; allergy; type. II hypersensitivity; Goodpasture's syndrome; type IV hypersensitivity; leprosy; infectious disease; viral infection; HIV; fungal infection; Candida; parasitic infection; schistosome; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 14 BP; 2 A; 2 C; 7 G; 3 T; 0 U; 0 Other;
             atrophic gastritis. Degenerative nervous system diseases include multiple sclerosis and Alzheimer's disease. Hypersensitivity diseases include Type I hypersensitivities such as contact with allergens that lead to allergies, Type II hypersensitivities such as those present in Goodpasture's syndrome and Type IV hypersensitivities such as those
                                                                                                                                                                                                                                                                                                                               Kit for diagnozing and treating T-cell associated diseases e.g. autoimmune, degenerative nervous system and infectious disease, comprises nucleic acid primers specifically priming and allowing amplification of a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      human; T-cell associated disease; Vbeta; autoimmune disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human Vbeta gene repeat sequence #263.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  ADH70473
                                                                                                                                                                                                                                                                             Disclosure; SEQ ID NO 667; 164pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                           WPI; 2004-059052/06.
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                                                                                                                                                                                                                                                                                                                 Vbeta
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19-SEP-1994;
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Pred. No.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.7e+03
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length 14;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      <u>,</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Gaps
                                                                                                                                diseases
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RESULT 2313
AAT52086
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Best Local (
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                                  02-SEP-1994

08-SEP-1994

23-SEP-1994

23-SEP-1994

23-SEP-1994

03-OCT-1994

07-OCT-1994

11-OCT-1994

11-OCT-1994
                                                                                                                                                          15-APR-1994;
15-APR-1994;
18-MAY-1994;
06-JUL-1994;
15-AUG-1994;
16-AUG-1994;
17-AUG-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  caused by viruses such as HIV, fungal infections such as those caused by the yeast genus Candida, parasitic infections such as those caused by schistosomes, filaria and bacterial infections such as those caused by Mycobacterium. Neoplastic diseases include lymphoproliferative disease such as leukaemias, lymphomas and cancers such as cancer of the brain, breast. The present sequence represents a Vbeta gene repeat sequence.
                                                                                                                                                                                                                                               29-MAR-1994;
04-APR-1994;
07-APR-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                     gene expression; downregulation; interleukin-5; IL-5; ICAM-1; intercellular adhesion molecule; rel A; tumour necrosis factor; TNF-alpha; respiratory syncytial virus; RSV; bcr-abl; oncogene; translocation; chronic myelogenous leukaemia; CML; cancer; philadelphia chromosome; inflammation; autoimmune disease; atherosclerosis; myocardial infarction; stroke; restenosis; transplant rejection; rheumatoid arthritis; psoriasis; myocardial ischaemia; Kawasaki disease; septic shock; HIV; human immunodeficiency virus; acquired immune deficiency syndrom
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 14
                                                                                                                                                                                                                                                                                                                                                                                     Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Enzymatic nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human ICAM hammerhead ribozyme target sequence (nt. position 2769).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                25-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAT52086 standard; RNA;
                                                                                                                                                                                                                                                                                                              23-FEB-1995;
                                                                                                                                                                                                                                                                                                                                     31-AUG-1995
                                                                                                                                              19-AUG-1994;
                                                                                                                                                                                                                                                                                    23-FEB-1994;
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14; Conserv
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (revised)
(first entry)
94US-00245736.

94US-00271280.

94US-00291332.

94US-00291433.

94US-00293520.

94US-0030000.

94US-00303039.

94US-00311748.

94US-00311749.

94US-0031771.

94US-00319492.

94US-003319492.

94US-00337608.

94US-003376847.

94US-00337684.

94US-00337687.
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94US-00222795.
94US-00224483.
94US-00227958.
94US-00228041.
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94US-00218934.
94US-00222795.
94US-00224483.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       acid; ribozyme; trans cleavage; inhibition;
downregulation; interleukin-5; IL-5; ICAM-1;
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Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               12
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               T; 0
                                                                                                                                                                                                                                                                                                                                                                                                                          immune deficiency syndrome; AIDS;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               U; 0 Other;
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RESULT 2314
AAT52112
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   enzymatic nucleic acid (i.e. a ribozyme) which cleaves ICAM-1 mRNA at the nucleotide base position indicated in the DE line. Regions of the mRNA that do not form secondary folding structures and that contain potential hammerhead and hairpin ribozyme cleavage sites were identified by computer analysis. Ribozymes directed against these mRNA sequences were designed and synthesised with modifications that improve their nuclease resistance. The ribozymes cleave the ICAM-1 target sequences and thereby inhibit ICAM-1 expression, making them useful for reducing transplant rejection and alleviating symptoms in patients with rheumatoid arthritis, asthma and other inflammatory disorders. (Updated on 25-MAR-2003 to correct PI field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Grimm S,
Modak A,
Tracz D,
                                                                                                                                                                                                                                                                            Enzymatic nucleic acid; ribozyme; trans cleavage; inhibition; gene expression, downregulation; interfleukin-5; IL-5; ICAM-1; intercellular adhesion molecule; rel A; tumour necrosis factor; TNF-alpha; respiratory syncytial virus; RSV; bcr-abl; oncogene; translocation; chronic myelogenous leukaemia; CML; cancer; philadelphia chromosome; inflammation; autoimmune disease; atherosclerosis; myocardial infarction; autoimmune disease; transplant rejection; rheumatoid arthritis; psoriasis; transplant rejection; Rawasaki disease; septic shock; HIV; myocardial ischaemia; Kawasaki disease; septic shock; HIV;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         23-DEC-1994;
30-JAN-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Ribozymes having modif
in inhibiting disease
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 1995-351090/45
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                                                                                                                                                                                                                                                            human immunodeficiency virus; acquired immune deficiency syndrome; AIDS;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Human ICAM hammerhead ribozyme target sequence (nt. position
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-MAR-2003
25-MAR-1997
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAT52112,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAT52112 standard; RNA; 15
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                                                                                                                                                                                      Homo sapiens
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Pavco P,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Usman
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          BP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         94US-00363233
95US-00380734
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          modified bases and methods for producing them -
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Beigleman L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.4%; 78.6%;
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3; Mismatches
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Matulic-Adamic J
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     No. 1.8e+03;
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31-AUG-1995

WO9523225-A2

23-FEB-1994; 23-FEB-1995;

94US-00201109 95WO-IB000156

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ADH70501
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AC ADH
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Best Local Similarity
Matches 11; Conserv
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17-AUG-1994
19-AUG-1994
02-SEP-1994
08-SEP-1994
23-SEP-1994
23-SEP-1994
23-CCT-1994
07-CCT-1994
01-CCT-1994
04-NOV-1994
                                                                                                                                                                                                                                                         hammerhead and hairpin ribozyme cleavage sites were identified by computer analysis. Ribozymes directed against these mRNA sequences were designed and synthesised with modifications that improve their nuclease resistance. The ribozymes cleave the ICAM-1 target sequences and thereby inhibit ICAM-1 expression, making them useful for reducing transplant rejection and alleviating symptoms in patients with rheumatoid arthritis, asthma and other inflammatory disorders. (Updated on 25-MAR-2003 to correct PI field.)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Modak
Tracz
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18-MAY-1994;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          29-MAR-1994;
                                                                                                                                                                                                                                                                                                                                                            The present sequence represents a preferred target sequence for an enzymatic nucleic acid (i.e. a ribozyme) which cleaves ICAM-1 mRNA at uncleotide base position indicated in the DE line. Regions of the mRNA that do not form secondary folding structures and that contain potential base positions.
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Ribozymes having modified bases and methods for producing them - in inhibiting disease related genes.
                        25-MAR-2004
                                                                                                                                                                                                                                        Sequence 15
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                                                                        ADH70501 standard; DNA; 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (RIBO-) RIBOZYME PHARM INC.
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                                                                                                                                                              CAGCCTCCTGAGTA 732
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Karpeisky A, Kisich K,
Pavco P, Beigleman L,
Usman N, Wincott FB, W
                                                                                                                                                                                        Conservative
                                                                                                                                                                                                                                        BP; 3
                        (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      94US-0022795
94US-0022483
94US-00228041
94US-00228041
94US-00229193
94US-0029193
94US-0029163
94US-0029163
94US-0029152
94US-00310000
94US-00311486
94US-00311486
94US-0031439
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                                                                                                                                                                                                  1.4%;
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                                                                                                                                                                                                                                        C; 3
                                                                                                                                                                                       Score 14; DB
Pred. No. 1.8e
3; Mismatches
                                                                                                                                                                                                                                        G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Direnzo A, Draper KG, Dudycz
ch K, Matulic-Adamic J, Mcswi
n L, Sullivan SM, Sweedler D,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sullivan SM, Woolf T;
                                                                                                                                                                                                                 DB 1;
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                                                                                                                                                                                                               Length 15;
                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Dudycz LW;
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ler D, Thompson JD;
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Human Vbeta gene repeat sequençe #291.

RESULT 2316 ADQ30131

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                                                                                                                           Matches
                                                                                                                                                         Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        human; T-cell associated disease; Vbeta; autoimmune disease; degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; reoplastic disease; hypersensitivity disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; degenerative nervous system disease; multiple sclerosis; Alzheimer's disease; hypersensitivity disease; type I hypersensitivity; doodpasture's syndrome; allergy; type II hypersensitivity; Goodpasture's syndrome; type IV hypersensitivity; leprosy; infections disease; viral infection; type IV hypersensitivity; leprosy; infection; schistosome; filaria; bacterial infection; parasitic infection; schistosome; filaria; bacterial infection; hypobacterium; neoplastic disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Kit for diagnozing and treating T-cell associated diseases e.g. autoimmune, degenerative nervous system and infectious disease, comprises nucleic acid primers specifically priming and allowing amplification of a
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure; SEQ ID NO 695; 164pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Hood LE,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            05-MAR-1999;
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                                                                                                                                                                                                                                                       Sequence
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19-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (HOOD/) HOOD L E. (ROWE/) ROWEN L.
                                                                                                                                                                                                                                                                                                                                                        such as leukaemias,
                                                            428
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                                                                                                                               14;
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   TTTTATTTTATTTT 14
                                        TTTTATTTATTT
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                                                                                                                                                                                                                                                       B₽;
                                                                                                                        Conservative
                                                                                                                                                                                                                                                                                                                      present sequence
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95US-00531241.
                                                                                                                                                                                                                                                       3 A;
                                                                                                                                                                                                                                                                                                                                                           lymphomas and cancers such as cancer of
                                                                                                                                                         100.0%;
                                                                                                                                                                                                                                                       0 C; 0 G;
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                                                                                                                                                         Score 14;
Pred. No.
                                                                                                                                                                                                                                                                                                                      represents a Vbeta gene
                                                                                                                                                                                                                                                          12 T; 0 U; 0 Other;
                                                                                                                               Mismatches
                                                                                                                                                                                 DB 1;
                                                                                                                                                             1.8e+03
                                                                                                                                                                                           Length 15;
                                                                                                                                                                                                                                                                                                                                                        the brain,
                                                                                                                               0,
                                                                                                                               Gaps
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ADQ30131 standard; DNA; 15

ВP

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CC This invention describes a novel nucleic acid containing a specific CC segment having at least one region that modulates expression of the VR1 CC (vanilloid receptor type 1) receptor, or a functional derivative, allele CC or fragment of this region, or a sequence that hybridises to it under CC standard conditions. The VR1 modulator is derived from one or more of CC positions 221931-223344 of GenBank AL670399, 31673-36359 of AL663116, or CC 44731-34231 or 36616-33151 of APIA68787 and is involved in transmission of CC describes a vector that contains the VR1 modulator, host cells containing CC this vector (other than human germ or embryonal stem cells) and a method for modulator or the vector into a cell that contains the VR1 gene. The CC products of the invention are used for detecting a transcription factor from its binding to a regulatory sequence (or a double-stranded CC oligonucleotide fragment of it), e.g. by Western blotting or enzyme-CC associated with overexpression or underexpression of the transcription factor. The region that modulates VR1 receptor expression includes a cC binding site for a transcription factor, e.g. MZPI, NFRappaB, NFAT or CC GATA1. The nucleic acids of the invention, or vectors containing them, CC eare used for prevention or treatment of pain, also for treating containing them, CC eare used for prevention or treatment of pain, also for treating them, CC eare used for sequence represents a fragment of murine VR1 exon 1d DNA which is capable of binding to a transcription factor.
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                                                                 Query Match
Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Murine VR1 exon 1d transcription factor binding fragment
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     09-SEP-2004
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New nucleic acid that modulates expression of the vanilloid receptor-1, useful for control of pain or sensitivity disorders, comprises sequences from control regions of the receptor gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 49;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   01-DEC-2003; 2003WO-EP013522.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO2004053120-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           pain transmission; primary sensory neuron; transcription factor;
detection; MZF1; NPkappaB; NPAT; GATA1; sensitivity disorder; analgesia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ds; VR1 receptor; vanilloid receptor type 1; modulator;
                                                                                                                                   Sequence 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2004-468868/44.
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                                806
                                                                 l Similarity
14; Conserv
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                         TTTTTGTTTGTTTG
 TTTTTGTTTGTTTG
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                                                               Conservative (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     (first
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                                                                                                                                       0 C; 3
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                                                                                                    1.4%;
 15
                                                                     0
                                                                   Score 14; DB; Pred. No. 1.8
                                                                                                                                       G; 12 T; 0 U; 0 Other;
                                                                                                    DB 1;
                                                                                     1.8e+03;
                                                                                                      Length 15;
                                                                       Indels
                                                                     0;
                                                                     Gaps
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RESULT 2317

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AACTCCTGACCTCA 16

Matches Query Match Best Local :

Similarity

1.4%;

Score 14; Pred. No.

1.8e+03; DB 1;

0,

Gaps

0

Length 16; Indels

Conservative

0

Mismatches

1124 AACTCCTGACCTCA 1137

Sequence 16

BP;

4 A;

6 C; 2 G; 4 T; 0 U; 0 Other;

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The invention relates to an isolated nucleic acid (N1) comprising at CC least 20 but not more than 1500 consecutive nucleotides of the optineurin CC promoter appearing as ADE13890. Also included are the optineurin promoter coperably linked to a heterologous nucleic acid, a nucleic acid capable of detecting a single nucleotide polymorphism (SNP) in the optineurin promoter promoter, a host cell comprising the promoter operably linked to a cc heterologous sequence, diagnosing or prognosing glaucoma in a sample cobtained from a cell or bodily fluid (comprising detecting a polymorphism cc in a promoter region of the optineurin gene, associated with a glaucoma cc in a promoter region of the optineurin gene, associated with a glaucoma cc phenotype), detecting a SNP sequence variation in a sample containing DNA, detecting the presence of an optineurin promoter sequence variation cc susceptibility to glaucoma or to a progressive ocular hypertensive cc disorder resulting in loss of visual field in a patient (or the severity or progression of glaucoma in a patient, comprising providing containing the variation within the optineurin cc promoter and amplifying the DNA) and detecting a polymorphism (comprising obtaining a sample containing human genomic DNA, providing a nucleic acid capable of detecting a SNP located within an optineurin promoter, and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New nucleic acid sequences of the optineurin gene are useful to detect polymorphisms particularly single nucleotide polymorphisms in the optineurin promoter to diagnose, prognose and treat glaucoma and relat
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SNP; glaucoma; progressive ocular hypertensive disorder; glaucoma related disorder; motif; repeat element; regula
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Optineurin promoter motif, repeat element or regulatory region #132
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           ADE14023;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (SIEE/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        06-MAR-2002; 2002US-00091281.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            06-MAR-2002; 2002US-00091281.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    09-OCT-2003
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                                                      detecting the polymorphism). The invention is used to diagnose and prognose glaucoma and also to treat glaucoma related disorders. The present sequence is an optineurin promoter motif, repeat element or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 11; SEQ ID NO 134; 159pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 2003-864168/80
                                      putative regulatory
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RAYMOND V.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             MORISSETTE J.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Morissette
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RESULT 2318
ADH70756
including autoimmune diseases, degenerative nervous system diseases, correct years to the seases, hypersensitivity diseases, infectious diseases, arrophic gastricis. Degenerative nervous system diseases include Addison's disease, arrophic gastritis. Degenerative nervous system diseases include multiple callergies, lype II hypersensitivities such as contact with allergens that lead to allergies, Type II hypersensitivities such as those present in codpasture's syndrome and Type IV hypersensitivities such as those present in caused by viruses such as HIV, fungal infections such as those caused by the yeast genus Candida, parasitic infections such as those caused by cobacterium. Neoplastic diseases include lymphoproliferative diseases such as leukaemias, lymphomas and cancers such as cancer of the brain, breast. The present sequence represents a Vbeta gene repeat sequence.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              human; T-cell associated disease; Vbeta; autoimmune disease; degenerative nervous system disease; graft versus host disease; hypersensitivity disease; infectious disease; neoplastic disease; hypersensitivity disease; atrophic gastritis; degenerative nervous system disease; multiple sclerosis; Alzheimer's disease; hypersensitivity disease; type I hypersensitivity disease; type I hypersensitivity; Goodpasture's syndrome; allergy; type II hypersensitivity; Goodpasture's syndrome; type II hypersensitivity; laprosy; infection; schistosome; filaria; bacterial infection; parasitic infection; schistosome; filaria; bacterial infection; Mycobacterium; neoplastic disease; lymphoproliferative disease; leukaemia; lymphoma; cancer; brain cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ADH70756 standard; DNA; 16
                                                                                                                                                                                                                                                                                                                                         associated diseases which comprises a panel of nucleic acid primers specifically priming and allowing amplification of each Vbeta gene, VbetaRNA or cDNA. The kit is useful for diagnosing organ transplant rejection and diagnosing and treating T-cell associated diseases
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Kit for diagnozing and treating T-cell associated diseases e.g. autoimmune, degenerative nervous system and infectious disease, compructeic acid primers specifically priming and allowing amplification
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          17-OCT-2002
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Disclosure; SEQ ID NO 950; 164pp; English
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19-SEP-1995;
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                                                                                                                                                                                                                                                                                                                                                                                                                            The invention relates to a kit for diagnosing and treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (HOOD/) HOOD L E. (ROWE/) ROWEN L.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
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95US-00531241.
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                                                                                                                                                                                                                                                                                                                                                                                                                              T-cell
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Query Match

Sequence 16

B₽;

N Ą

0 C; 0

G; 14 T; 0 U; 0 Other;

Score 14;

ВB 1;

Length 16;

Query Match Best Local Similarity

100.0%;

Score 14; Pred. No.

DB 1; L . 1.9e+03;

Length 17;

1.4%;

Sequence

17 BP;

4 A;

7 C; 3

G; 3 T; 0 U; 0 Other;

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AAT93362
ID AAT9336
XX AAT9336
XX IMAGE CAMAR-
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                                                       CC markers. Mutations in the amplification primers for microsatellite CC markers. Mutations in the amplified sequences can be detected using the CC nucleic acid sequences of the invention (see AAT93326-T93354). The CC region of human chromosome 10 bounded by the markers D105541 and D105215. CC (I) is a tumour suppressor gene, particularly involved in prostatic CC cancer but also in melanoma, glioma and non-Hodgkin's lymphoma. Any CC nucleic acid that hybridises selectively to the specified chromosomal CC region can be used to determine susceptibility of a patient to cancer and CC for diagnosis/prognosis, sepecially of prostatic cancer, i.e. by CC treat cancer, especially when included in a viral vector. Similar CC treat cancer, sepecially when included in a viral vector. Similar CC treat cancer, sepecially when included in a viral vector. Similar CC molecules capable of hybridising to the protein, particularly antibodies. CC The labelled molecules when coupled to a cytotoxin can be used for cancer treatment. The encoded protein can be used to raise antibodies and these CC used to screen DNA expression libraries or for polypeptide isolation. (I) CC allows differential diagnosis between neoplasia and hyperplasia of the prostate (all tumours with a log loss have lost this region) and CC determination of micro-metastases in the blood
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Nucleic acid hybridising to chromosome for diagnosis, prognosis and treatment assessing susceptibility to cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         IMAGE clone 264611; gene fragment; human; chromosome 10; D10S541 marker; D10S215 marker; tumour suppressor gene; prostatic cancer; cancer therapy; melanoma; glioma; non-Hodgkin's lymphoma; cancer susceptibility; diagnosis; prognosis; mutation detection; suppressor gene; neoplasia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAT93362 standard; DNA; 17 BP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      06-MAR-1998
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO9715686-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (IMCR ) IMPERIAL CANCER RES TECHNOLOGY.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         433
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           14;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TTTTATTTTTTTA 446
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Page 68; 127pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
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Mismatches 0;
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RESULT 2320
AAA22845
                        Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                     07-OCT-1999.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               19-JUN-2000
                                                                                                                                                                                                                                          The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl
                                                                                                                                                                                                                                                                          Claim 54; Page 246; 305pp; English
                                                                                                                                                                                                                                                                                                                              WPI; 1999-591315/50
                                                                                                                                                                                                                                                                                                                                                                       (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                            27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                 24-MAR-1999;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Homo sapiens
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         syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
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                                                                                                                                                                                                                                                                                               mRNA encoding an angiogenic factors
                                                                                                                                                                                                                                                                                                         ribozymes for modulating the synthesis,
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 subunit alpha-6,
                                                                                                                                                                                                                                                                                                                                                   Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Conservative
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  subunit beta-3
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RESULT 2321
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Creaving activity, which specifically cleave RNA encoded by an aryl colleave mindered by anyl colleave mindered by an aryl colleave 
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Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                AAA22806 standard; RNA; 17 BP.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Claim 54; Page 243; 305pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors.
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Pred. No. 1.9e+0:
6; Mismatches
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ARASULT 2322
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The present invention describes enzymatic nucleic acid molecules with RNA cleave RNA encoded by an aryl cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA17561 to AAA17562 represent ribozyme sequences for ARNT, and AAA17168 to AAA17563 to AAA17623 ro AAA17644 represent their corresponding target sequences; AAA17655 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA17655 to AAA18385 and AAA18386 to AAA19086 and AAA19155 to AAA20361 and AAA21501 to AAA21505 represent ribozyme sequences for integrin alpha 6 subunit, and AAA20362 to AAA21509 and AAA21505 to AAA21505 t
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAA22967 standard; RNA; 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                           54; Page 253; 305pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 RIBOZYME PHARM INC.
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3; Conser
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   BP; 0 A; 0 C; 3 G; 0 T; 14 U; 0 Other;
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Pred. No.
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAA22807 standard; RNA; 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 339
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               14 TGCCCAAGCTGGTC 1
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Pred. No.
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Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Homo sapiens Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss

24-MAR-1999; 99WO-US006507

27-MAR-1998; 98US-0079678P

(RIBO-) RIBOZYME PHARM INC

Pavco PA, Roberts E, Jarvis T, Coeshott C, Mcswiggen JA;

WPI; 1999-591315/50.

ribozymes for modulating the synthesis, mRNA encoding an angiogenic factors. expression and/or stability

Claim 54; Page 243; 305pp; English

The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNF) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17560 and AAA17623 to AAA1784 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19233 to AAA20361 and AAA21501 to AAA21595 represent ribozyme

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AAA22973/c
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Best Local S
Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; aryl hydrocarbon nuclear transport; ARNT; TIB-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis, pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and AAA21596 to AAA21688 represent their corresponding target sequences; AAA21689 to AAA22475 and AAA23263 to AAA23342 represent ribozyme seq for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to
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WPI; 1999-591315/50
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
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                                                                                                                          RIBOZYME
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                                                           Roberts E,
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                                                              Jarvis
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Pred. No. 1.9e+03;
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT,

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expression and/or stability

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Claim 54; Page 246; 305pp; English

54; Page 254; 305pp; English

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RESULT 2325
AAA22846
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Best Local 9
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tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; AkMU; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human, aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Integrin subunit beta 3 substrate sequence SEQ ID
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                                                                                                                                                                                                                                                                                                                              24-MAR-1999;
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WPI; 1999-591315/50
                                                                                 Pavco
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                                                                                                                                                               RIBOZYME PHARM
                                                                         Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first entry)
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                                                                                 Jarvis T,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ВÞ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  0,
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Pred. No.
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                                                                                     Coeshott
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             1.9e+03;
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                                                                                     Mcswiggen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             NO:6072
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       0
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RESULT 2326
AAF06152
ID AAF0615
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Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT; integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 17 BP; 5 A; 1 C; 4 G; 0 T; 7 U; 0 Other;
                                          Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor pro
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Ribozyme; erythropoietin; granulocyte colony stimulating factor; interferon alpha; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         16-FEB-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAF06152 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
                                                                                                                                                                                                                                                                        Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                           12-APR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     11-APR-2000; 2000WO-US009721
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useful for producing e.g. granulocyte colony interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                       2000-647423/62.
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                                                                                                                                                                                                                                                                                                                                                                      RIBOZYME PHARM INC.
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                                                                                                                                                                                                                                                                        Zwick M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Conservative
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                                                                                                                                                                                                                                                                        Pavco P,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     1.4%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    0
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                                          factor protein,
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The present invention relates to enzymatic and antisense nucleic acid

Claim 42;

Page 123; 164pp; English.

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RESULT 2327
AAF05507
ID AAF0550
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Matches
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                                                                                                                        The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EAR3/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP). Thibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of erythropoietin, granulocyte colony stimulating factor protein and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           :7.
                                                                                                                                                                                                                                                                                   Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein,
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                                                                                 Sequence 17 BP; 1 A; 1 C; 2 G; 13 T; 0
                                                                                                                                                                                                                                           Claim 18; Page 118; 164pp; English.
                                                                                                                                                                                                                                                                                                                                WPI; 2000-647423/62.
                                                                                                                                                                                                                                                                                                                                                          Blatt L,
                                                                                                                                                                                                                                                                                                                                                                                                                   12-APR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                               11-APR-2000; 2000WO-US009721.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Ribozyme; erythropoietin; granulocyte colony stimulating factor;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Hammerhead ribozyme substrate #2726
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         interferon alpha
                                                                                                                                                                                                                                                                      useful for producing interferon alpha and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             interferon alpha;
                                                                                                                                                                                                                                                                                                                                                                                       (RIBO-) RIBOZYME PHARM INC
                                                                                                             nterferon
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2; Conserv
                                         Similarity
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                                                                                                             alpha
                            Conservative
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                                                                                                                                                                                                                                                                                                                                                          Pavco P,
                                                                                                                                                                                                                                                                      e.g. granulocyte erythropoietin.
                                         100.0%;
                                                        1.4%;
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                                         Score 14;
Pred. No.
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Pred. No. 1.9e+03;
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                            Mismatches
                                                     DB 1;
                                                                                 U; 0 Other;
                                         1.9e+03;
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                                                     Length 17;
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RESULT 2328 ABT36209

ABT36209 standard; DNA;

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The invention relates to a novel isolated 17 mer nucleic acid sequence, cc given in the specification, a sequence containing at least 15 consecutive cnucleotides from the 17 mer sequence with, after optimal cc alignment, at least 80 % identity to the 17 mer sequence that cc hybridizes to them under highly stringent conditions, or the complement cc acids of the invention are useful as probes and primers for detecting, cc identifying, quantifying and/or amplifying a nucleic acid, e.g. as one cc component of a gene chip, in vitro as (anti)sense reagents, and for cr production of recombinant polypeptides. Any of the nucleic acids, cc polypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for c preparation of pharmaceuticals for prevention and/or treatment of viral cd degeneration, specifically cancer but also Alzheimer's disease and containing the acid samples is useful for diagnosis and/or prognosis of these cd diseases. The polypeptides can also be used to generate antibodies, and containing the polypeptides and antibodies are useful as components of these caid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene cherapy. This polynucleotide sequence represents a tumour suppression crelated human fukutin oligonucleotide of the invention.
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                                                                                   Query Match
Best Local Similarity
                                                                    Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure; Page 248;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Telerman A,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        17-SEP-2001; 2001FR-00011978
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                                                                                                                                        Sequence 17 BP; 5
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                                                                    14;
                                GATCACAGCTCACT 505
                                                                    Conservative
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                                                                                                                                        A; 5 C; 3 G; 4 T; 0 U; 0 Other;
                                                            1.4%; 5cc
100.0%; Pr/
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                                                                                   Score 14; DB 1;
Pred. No. 1.9e+(
                                                                    Mismatches
                                                                                       1.9e+03;
                                                                                                        Length 17;
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RESULT 2329

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AC ADB
XX
DT 20-XX
DE Hum

ADB04201;

ADB04201 standard; DNA; 17

0

20-NOV-2003

(first entry)

Human MDZ7 scanning oligonucleotide SEQ ID 5187

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                                                                                                                                                                                                                 The present invention relates to novel human zinc finger-containing CC proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is CC encoded at chromosome 7922.1, MDZ4 is encoded at chromosome 6921.3-22.2, MDZ7 is encoded at chromosome 16911.2 and MDZ12 is encoded at chromosome CC 15926.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, CC or in manufacturing a medicament for treating or preventing a disorder CC associated with decreased or increased expression or activity of MDZ3, CC MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic CC acids and proteins are also useful for diagnosing or monitoring a disease CC caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic CC acids can also be used as probes to detect and characterize gross CC alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are CC useful in constructing microarrays for measuring gene expression. The CC proteins are useful as therapeutic agents for gene therapy or as CC vaccines. The present sequence was used to illustrate the invention.
RESULT 2330
                                                                                                                      Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7 chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ7 or MDZ12, e.g. cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       developmental disorder; ss.
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                                                                                                                                                                                        Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     WPI; 2003-423107/40.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Shannon M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             02-AUG-2001; 2001US-00922181
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 8; SEQ ID NO 5188; 103pp; English.
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                                                                                   162 ATTTTGTATTTTT 175
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                                                                                                                      14;
                                                                                                                                       Similarity
                                                    ATTTTGTATTTTT
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                                                                                                                                                                                          BP; 2 A; 0 C; 4 G; 11 T; 0 U; 0 Other;
                                                                                                                    Conservative
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                                                                                                                 100.0%; +-
                                                    16
                                                                                                                                        Score 14; DB 1; Length 17; Pred. No. 1.9e+03;
                                                                                                                          Mismatches
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ADB04204
ID ADB0
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AC ADB0
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AC ADB0
XX
DT 20-1
XX
Hum
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Cyc
KW Cyc
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Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome fpp1.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12. The probes are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ7 or MDZ12, e.g. cancer.
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                      Homo sapiens
                                                                     Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    02-AUG-2001; 2001US-00922181
                                                                                                                                           Human MD27 scanning oligonucleotide SEQ ID 5190.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Example 8; SEQ ID NO 5187; 103pp; English
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                                                       developmental
                                                                                                                                                                                20-NOV-2003
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                                                                                                                                                                                                                                                                                                                                                                                                                              Local
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                                                                                                                                                                                                                                                                                                                                                                                                                              Similarity
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Pred. No.
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Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                1.9e+03;
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proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 1fp11.3 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosting or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ4, MDZ7 or MDZ12, e.g. cancer.
                                                                                                         useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
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                                                             Sequence 17 BP; 3 A; 0 C; 2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                               Example 8; SEQ ID NO 5190; 103pp; English
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Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Nguyen
                                                                  G; 12 T; 0 U;
                         DB 1;
  1.9e+03;
                                                                    0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                      zinc
                    Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                      finger-containing
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뮍 5 Query Match Best Local S Matches 14 162 ATTTTGTATTTTT 175 Conservative , 100.0%; s; Score 14; DB; Pred. No. 1.9 Indels 0 Gaps

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RESULT 2332
ADB04203
ID ADB0420
Human MDZ7 scanning oligonucleotide SEQ ID
                                                                             20-NOV-2003
                                                                                               ADB04203 standard; DNA; 17
                                                                             (first entry)
                                                                     5189.
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Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7 30-JUL-2002; 2002EP-00016874 Homo sapiens. developmental disorder; ss. chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; 7q22.1; cancer;

02-AUG-2001; 2001US-00922181

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RESULT 2333
ADB04279
ID ADB0427
XX ADB0427
XX ADB0427
XX ADB0427
XX ADB0427
XX COVERT
XX CYCOSTS
KW CYCOSTS
KW Chromos
KW Chromos
KW Chromos
XX Chromos
XX
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human MDZ7 scanning oligonucleotide SEQ ID 5265
   New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder
                                                                                                                                                                                                                                                                                                                                                                                            05-FEB-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   developmental disorder; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer;
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                                                                                                                                                          Shannon M,
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                                                                                                                                                                                                                                                                                                                                 30-JUL-2002;
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ilarity 100.0%;
Conservative
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                                                                                                                                                                                                                                                                                                                                 2002EP-00016874.
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Pred. No.
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proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 1fp11.2 and MDZ12 is encoded at chromosome 15g26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for dispnasing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 energic locus. The probes are
                                                 useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       associated with decreased or increased expression or activity of MDZ3, MDZ7 or MDZ12, e.g. cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         SEQ ID
                                                                                                                                                                                                                                                                                                                                                                                                                                                     invention relates to novel human zinc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NO 5265; 103pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                  finger-containing
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Matches
                             Query Match
Best Local :
                                                         Sequence 17 BP; 4 A; 1 C; 3 G; 9 T; 0 U; 0 Other;
614 TTTTTTGAGACAGA 627
                   14;
                              Similarity
                   Conservative
                              100.0%;
                    0
                                        Score 14;
                                Pred. No.
                     Mismatches
                                        DB 1;
                                1.9e+03;
                     0
                                          Length 17;
                      Indels
                     0;
                      Gaps
                      0,
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RESULT 2334
Cytostatic;
                           Human MDZ7 scanning oligonucleotide SEQ ID
                                                         20-NOV-2003
                                                                                      ADB04286;
                                                                                                                 ADB04286 standard; DNA; 17
                                                                                                                                                                                           4
                                                                                                                                                                                           TTTTTGAGACAGA 17
                                                          (first entry)
                               5272
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zīnc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; developmental disorder; ss Homo sapiens. immunostimulant; gene therapy; vaccine; human; protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7

cancer;

EP1281758-A2.

05-FEB-2003.

30-JUL-2002; 2002EP-00016874.

02-AUG-2001; 2001US-00922181

(AEOM-) AEOMICA INC

Shannon ĭ GuY, Nguyen

WPI; 2003-423107/40.

New zinc finger-containing proteins and nucleic acids, useful manufacturing a medicament for treating or preventing a disord associated with decreased or increased expression or activity MDZ4, MDZ7 or MDZ12, e.g. cancer. a disorder
activity of MDZ3,

8; SEQ IJ NO 5272; 103pp; English.

The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7q22.1, MDZ4 is encoded at chromosome 6p21.3-22.2,

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ADB0431
ID AD
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Best Local S
Matches 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 15q26.1. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross alterations in MDZ3, MDZ4, MDZ7, or MDZ12 genetic locus. The probes are useful in constructing microarrays for measuring gene expression. The proteins are useful as therapeutic agents for gene therapy or as vaccines. The present sequence was used to illustrate the invention.
The present invention relates to novel human zinc finger-containing proteins and their coding sequences: MDZ3, MDZ4, MDZ7, MDZ12. MDZ3 is encoded at chromosome 7g22.1, MDZ4 is encoded at chromosome 6p21.3-22.2, MDZ7 is encoded at chromosome 16p11.2 and MDZ12 is encoded at chromosome 1ep26. The MDZ3, MDZ4, MDZ7, and MDZ12 sequences are useful in therapy, or in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3, MDZ4, MDZ7, or MDZ12, e.g. cancer or developmental disorders. The nucleic acids and proteins are also useful for diagnosing or monitoring a disease caused by altered expression of MDZ3, MDZ4, MDZ7, or MDZ12. The nucleic acids can also be used as probes to detect and characterize gross
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   New zinc finger-containing proteins and nucleic acids, useful in manufacturing a medicament for treating or preventing a disorder associated with decreased or increased expression or activity of MDZ3,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cytostatic; immunostimulant; gene therapy; vaccine; human; zinc finger protein; MDZ3; MDZ4; MDZ7; MDZ12; chromosome 7q22.1; chromosome 6p21.3-22.2; chromosome 16p11.2; chromosome 15q26.1; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         EP1281758-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Homo sapiens.
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                                                                                                                                                                                                                                                                                                                                                                                                       Example 8;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           30-JUL-2002; 2002EP-00016874.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   developmental disorder; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           20-NOV-2003
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                                                                                                                                                                                                                                                                                                                                                                                                       SEQ ID NO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    or MDZ12, e.g. cancer.
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ilarity 100.0%;
Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gu Y,
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                                                                                                                                                                                                                                                                                                                                                                                                       5297; 103pp; English
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Pred. No.
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1.9e+03;
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GATCTGCCTGCCTC

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GATCTGCCTGCCTC

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RESULT 2336
ACC64260
ID ACC64260
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Best Local S
Matches 14
             Query Match
Best Local
Matches
                                                                               The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   useful in constructing microarrays for measuring gene expre
proteins are useful as therapeutic agents for gene therapy
vaccines. The present sequence was used to illustrate the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              alterations in MDZ3, MDZ4, MDZ7,
                                                                                                                                                                                                                                                                      New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mus musculus
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; murine; tumour suppression; tumour reversion; apoptosis; virus resistance; viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Murine oligonucleotide associated with tumour supression, SEQ ID 1507.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ACC64260;
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                                                      Sequence 17
                                                                                                                                                                                                                                                                                                                                                            Telerman
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                           27-MAR-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              schizophrenia; ss.
                                                                                                                                                                                                                                           Disclosure; Page
                                                                                                                                                                                                                                                                                                                                                                                                                    17-SEP-2001; 2001FR-00011979.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WO2003025176-A2
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              Similarity
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Conservative (
                                                     BP; 2 A; 8 C; 3 G; 4 T; 0 U; 0 Other;
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Conservative
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 Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             BB
                             DB 1;
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              1.9e+03
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RESULT 2337
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ACC68567
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Best Local (
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                                                                                                                                                                                                                                                                                                                                                              The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      01-JUL-2003
                                                                                                                                                                                                                                                                                                                                   Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2003-333167/31.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          schizophrenia;
tumour suppression;
 Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; murine; tumour suppression; tumour reversion; apoptosis; virus resistance;
                                            Murine oligonucleotide associated with tumour supression,
                                                                          01-JUL-2003
                                                                                                                                     ACC68567 standard; DNA; 17
                                                                                                                                                                                                                                                                                        Local Similarity 100.0%;
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                                                                                                                                                                                                                                                                                                                                     BP; 3
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                                                                                                                                                                                                                                                                          Conservative
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                                                                                                                                                                                                                                                                                                                                     1 C; 1 G; 12 T; 0 U; 0 Other;
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100.0%; Pred. No. 1.9e+03;
ive 0; Mismatches 0;
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                                               SEQ ID 5814.
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                                                                                                                                                                                                                                                                            Gaps
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ADB40764
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       The present invention relates to murine oligonucleotides (ACC62754-ACC68806), which are associated with tumour suppression, tumour reversion, apoptosis and virus resistance. The oligonucleotides are useful as (1) as probes and primers for detecting, identifying, quantifying and/or amplifying nucleic acid, e.g. as one component of a gene chip; in vitro as (anti)sense reagents; and (2) for production of recombinant polypeptides. The oligonucleotides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell degeneration, specifically cancer but also Alzheimer's disease and schizophrenia
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      viral disease; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             17-SEP-2001; 2001FR-00011979
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         17-SEP-2002; 2002WO-IB004210
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        schizophrenia;
                                                                                                                                                                      cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss;
primer; probe; tumour suppression; tumour reversion; apoptosis;
virus resistance; transgenic animals; Alzheimer's disease; schizophrenia;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17 BP; 2 A; 7 C; 3 G; 5 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Disclosure; Page 710; 738pp; French.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mus musculus
             17-SEP-2001; 2001FR-00011981
                                                                                                                                                                   primer; probe; tum
virus resistance;
                                                                                                                                                                                                                        Tumour suppression/reversion associated nucleotide #1087
                                                                                                                                                                                                                                                                                                                            ADB40764 standard; DNA; 17 BP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (MOLE-)
                                        17-SEP-2002; 2002WO-IB004219
                                                                    15-MAY-2003
                                                                                               WO2003040369-A2
                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                 ADB40764;
                                                                                                                                                                                                                                                                   18-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                         837 GATCTGCCTGCCTC 850
                                                                                                                                                                                                                                                                                                                                                                                                   μ
                                                                                                                                                                                                                                                                                                                                                                                                                                                          14;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Similarity
                                                                                                                                                                                                                                                                                                                                                                                                   GATCTGCCTGCCTC
                                                                                                                                                                                                                                                                                                                                                                                                                                                            Conservative
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                                                                                                                                                                                                                                                      (first entry)
                                                                                                                                                                                                                                                                   (revised)
                                                                                                                                                                   transgenic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          100.0%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Score 14;
Pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                               Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
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ADB40441/c
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting, identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as calls containing the vectors, the encoded polypeptides and antibodies (also vectors containing them and cells containing the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours or cell degeneration (e.g. Alzheimer's disease or schizophrenia).

Analysis of the expression of the nucleotides can be used for diagnosis of the polypeptide are useful for prevention and/or prognosis of these diseases. The nucleotides and polypeptides can be used to screen for their specific interactive molecules, containly useful for treating diseases associated with abnormal contains of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Query Match
Best Local
                                                                                                                                                                                                                                                          cytostatic; antiviral; neuroprotective; nootropic; neuroleptic; ss; primer; probe; tumour suppression; tumour reversion; apoptosis; virus resistance; transgenic animals; Alzheimer's disease; schizoph
 Telerman A,
                                                                                                                                                                                                                                                                                                                                                                     18-DEC-2003
04-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17 BP; 4 A; 5 C; 4 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotide
                                    (MOLE-) MOLECULAR ENGINES LAB
                                                                    17-SEP-2001; 2001FR-00011981.
                                                                                                       17-SEP-2002; 2002WO-IB004219
                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                       ADB40441;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  fragments of at least 15 consecutive nucleotides of these nucle sequence having at least 80% identity, after optimal alignment,
                                                                                                                                                                        WO2003040369-A2
                                                                                                                                                                                                                                                                                                                                  Tumour suppression/reversion associated nucleotide #764
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  nucleotides, a sequence that hybridizes under stringent
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                384 CTCCCAAAGTGCTG 397
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            acid encoding human prostate membrane-specific antigen, for treatment of tumors and viral infection, also related
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Page 159;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            and antibodies.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
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Amson R,
                                                                                                                                                                                                                                                                                                                                                                   (revised)
(first entry)
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 Tuijnder M;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 these nucleotides, a lalignment, with the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    conditions with
                                                                                                                                                                                                                                                             schizophrenia;
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polypeptide
                                                                                                                                                                                                       nucleotides, a sequence that hybridizes under stringent conditions with the nucleotides, or the complement, or corresponding RNA, of the nucleotides. The nucleotides are used as probes or primers for detecting identifying, quantifying and/or amplifying nucleic acids, as in vitro sense and antisense sequences, of nucleotides involved in tumour suppression or reversion, apoptosis and or viral resistance, to produce recombinant polypeptides, and to prepare transgenic animals, as experimental models. The nucleotides (also vectors containing them and cells containing the vectors), the encoded polypeptides and antibodies (Ab) against the polypeptide are useful for prevention and/or treatment of viral infections or diseases characterized by development of tumours
                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to the isolation of 6327 nucleotide sequences, fragments of at least 15 consecutive nucleotides of these nucleotides, a sequence having at least 80% identity, after optimal alignment, with the nucleotides, a sequence that hybridizes under stringer and it is not the nucleotides, as sequence that hybridizes under stringer and its nucleotides.
                                             or cell degeneration (e.g. Alzheimer's disease or schizophrenia).
Analysis of the expression of the nucleotides can be used for diagnosis and/or prognosis of these diseases. The nucleotides and polypeptides can also be used to screen for their specific interactive molecules, potentially useful for treating diseases associated with abnormal expression of the nucleotides.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New nucleic acid encoding human prostate membrane-specific antigen, useful e.g. for treatment of tumors and viral infection, also related
Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page 121; 771pp; French.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          WPI; 2003-441574/41
17 BP; 5 A; 4 C; 5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               and antibodies.
  G; 3 T; 0
     U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                   for detecting
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밁 Ś Matches Query Match Best Local (938 TGTTACCCAGGCTG 951 17 Similarity TGTTACCCAGGCTG 4 Conservative (1.4%; Score 14; DB; Pred. No. 1.9 DB 1; 1.9e+03; Length 17; Indels 0 Gaps 0

RESULT 2341 ADI47773 tumour suppression; tumour reversion; apoptosis; virus resistance; cytostatic; virucide; neuroprotective; nootropic; neuroleptic; proprimer; PCR; gene chip; antisense; viral disease; tumour; Homo sapiens Human tumour suppression/reversion-related DNA sequence SeqID276. 15-APR-2004 ADI47773 standard; DNA; 17 WO2003025177-A2 degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human. (first entry)

New isolated nucleic acid, useful for treating viral diseases associated

WPI; 2003-313354/30.

27-MAR-2003

17-SEP-2001; 2001FR-00011980 L7-SEP-2002; 2002WO-IB004523

MOLECULAR ENGINES LAB

A, Amson R,

Tuijnder M;

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the development of compounds with a cytostatic, virucide, neuroprotective, nootropic or neuroleptic activity. The DNA sequences may be useful as probes and primers for detecting, indentifying, quantifying and/or amplifying nucleic acid, for example as one component of a gene chip, in vitro as antisense reagents and for production of recombinant convitro as antisense reagents and for production of recombinant convitro as antisense reagents and for production of recombinant convitro as antisense reagents and for production of recombinant convitro as antisense reagents and for production of recombinant convitro as antisense revelopment of treatment of viral diseases that comparation and/or treatment of viral diseases that care characterised by development of tumours or cell degeneration. The greenst sequence is that of a nucleic acid sequence of the invention.

Note: The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO at figure and supplies and supplies and the printed specification, but was obtained in electronic format directly from WIPO at figure and supplies and supplies
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Best Local S
Matches 14
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  This invention relates to novel isolated nucleic acid sequences involved in the phenomena of tumour suppression, tumour reversion, apoptosis and/or resistance to viruses. The invention may be useful for the
                                                                                                                                                                                                                                                                                                                                                                                                                17-SEP-2002; 2002WO-IB004523
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            cytostatic; virucide; neuroprotective; nootropic; neuroleptic; probe; primer; PCR; gene chip; antisense; viral disease; tumour;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Human tumour suppression/reversion-related DNA sequence SeqID1221.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       15-APR-2004
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                                                                                                                                        New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
                                                                                                                                                                                                                                                                                                                                                                     17-SEP-2001; 2001FR-00011980
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                                                                                               Disclosure;
                                                                                                                                                                                                                                                                            Telerman A,
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                                                                                                                                                                                                                                   2003-313354/30.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      degeneration; cancer; Alzheimer's disease; schizophrenia; ds; human
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     suppression; tumour reversion; apoptosis; virus resistance;
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                                                                                               SEQ ID NO 1221;
                                                                                                                                                                                                                                                                            Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
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cells.
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                                                                                                                                                                                                                                                                            Tuijnder M;
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Pred. No.
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Best Local :
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                 prostaglandin D2 receptor; PTGDR, IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cance; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthrit; restenosis; asthma; Crohn's disease; diabetes; obesity; autoimmune disease; lupus; multiple sclerosis; transplant rejection; schaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK;
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                                                                                                                                                                                                                                                    05-APR-2001; 2001US-00827395.
29-MAY-2001; 2001US-0294412P.
28-AUG-2001; 2001US-0315315P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human PKR substrate sequence #549.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ADL49435;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 ADL49435 standard; RNA; 17
                                                                                                                                                         WPI; 2003-058513/05
                                                                                                                                                                                         Blatt L,
                                                                                                                                                                                                                                                                                                                     03-APR-2002; 2002WO-US010512
                                                                                                                                                                                                                                                                                                                                                         17-OCT-2002.
                                                                                                                                                                                                                                                                                                                                                                                         WO200281628-A2
                                                                                                                                                                                                                                                                                                                                                                                                                       Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                     substrate;
                                                                                                                                                                                                                         (RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      717 CCCAGCCTCCTGAG 730
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  14;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  4 CCCAGCCTCCTGAG 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Similarity
                                                                                                                                                                                         Chowrira B,
                                                                                                                                                                                                                                                                                                                                                                                                                                                     gb.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 100.0%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1.4%;
                                                                                                                                                                                         Haeberli
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ВP
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Score 14;
Pred. No.
                                                                                                                                                                                            ۵,
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                                                                                                                                                                                          Mcswiggen
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1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         cord injury; cancer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     0,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        arthritie;
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Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase of protein kinase PKR genes, for treating cancer and inflammatory disease

disease.

or

invention comprises nucleic acids (e.g. antisense oligonucleotides) t down regulate the expression or inhibit the function of a receptor a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR)

Claim 59;

SEQ ID NO

2968; 317pp;

English

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ADL49461
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Best Local Similarity
Matches 10; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restences or asthma), Crohn's disease, diabetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The nucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of a target RNA in a cell. The present RNA sequence represents a human PKR enterests.
                                                                                                      Novel enzymatic nucleic acid that down-regulates expression of neurite growth inhibitor receptor, prostaglandin D2 receptor, IkappaB kinase or protein kinase PKR genes, for treating cancer and inflammatory disease.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       antisense oligonucleotide; neurite growth inhibitor; NOGO; prostaglandin D2 receptor; PTGDR; IkappaB kinase; IKK; protein kinase PKR; cerebrovascular accident; central nervous system injury; CNS injury; spinal cord injury; cancer; melanoma; lymphoma; glioma; inflammatory disease; rheumatoid arthritis; restenosis; asthma; Crohn's disease; disease; rheumatoid; rejection; autolmmune disease; lupus; multiple sclerosis; transplant rejection; graft rejection; ischaemia; reperfusion; glomerulonephritis; sepsis; allergy; asthma; allergic rhinitis; atopic dermatitis; human PKR; substrate; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence 17
                                                                                                                                                                                                                                                                                                   05-APR-2001; 2001US-00827395
29-MAY-2001; 2001US-0294412P
28-AUG-2001; 2001US-0315315P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Unidentified.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ADL49461 standard;
                                                                                                                                                                                                                                                                                                                                                                                03-APR-2002; 2002WO-US010512.
                                                                                                                                                                                                                                                                                                                                                                                                                     17-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                        WO200281628-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 substrate; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Human PKR substrate
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                                                                                                                                                                                         2003-058513/05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          724 TCCTGAGTAGCTGG 737
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                                                                                                                                                                                                                                                                 RIBOZYME
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         UCCUGAGUAGCUGG 14
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            sequence.
                                                                                                                                                                                                                          Chowrira B,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      BP; 3 A; 3 C; 5 G; 0 T; 6 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
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                                                                                                                                                                                                                                                               PHARM
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            RNA;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            sequence #575.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 entry)
                                                                                                                                                                                                                            Haeberli
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Pred. No. 1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Mismatches
                                                                                                                                                                                                                          Mcswiggen J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                0;
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                                                                                                                                                                                                                          Fosnaugh
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The invention comprises nucleic acids (e.g. antisense oligonucleotides) that down regulate the expression or inhibit the function of a receptor for a neurite growth inhibitor, NOGO, prostaglandin D2 receptor (PTGDR)

Query Match Best Local Similarity

100.0%;

Score 14; Pred. No.

DB 1; 1.9e+03;

Length 17;

1.48;

Sequence 17

B₽;

2 A;

5 C; 5

G; 5 T; 0 U; 0 Other;

Claim 59;

SEQ ID NO 2994; 317pp; English.

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RESULT 2345
ACC85669
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Best Local S
Matches 11
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                IkappaB kinase (IKK), or protein kinase PKR. The nucleic acids of the invention are useful for treating: cerebrovascular accident, central nervous system (CNS) injury, spinal cord injury, cancer (e.g. melanoma, lymphoma or glioma), inflammatory disease (e.g. rheumatoid arthritis, restenosis or asthma), Crohn's disease, disetes, obesity, autoimmune disease, lupus, multiple sclerosis, transplant/graft rejection, ischaemia/reperfusion injury, glomerulonephritis, sepsis, and allergic conditions (e.g. asthma, allergic rhinitis or atopic dermatitis). The mucleic acids of the invention are also useful for down-regulating the expression of a target gene and as a diagnostic tool to examine genetic drifts and mutations within diseased cells or to detect the presence of target RNA in a cell. The present RNA sequence represents a human PKR
                              The present invention relates to a method of identifying RNA ligands that bind to a target molecule, comprising treating a first pool of RNA ligands that collectively bind more than one target under conditions effective to reduce the concentration or eliminate the presence of one or more predominate target-binding RNA ligands from the first pool of RNA ligands. In particular, the method can be used to identify RNA aptamers capable of binding to heat shock factor protein. The present sequence is a DNA sequence shown in the exemplification of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 17 BP; 4 A; 2 C; 7
                                                                                                                                                                                          Disclosure; Page 65;
                                                                                                                                                                                                                                           Identifying RNA ligands that bind to a target molecule comprises treating a first pool of RNA ligands that collectively bind more than one target to reduce the concentration or eliminate the presence of target-binding
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            31-DEC-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               RNA aptamer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  RNA ligand aptamer marker/probe Anti-BBSII.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      22-APR-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   substrate sequence.
                                                                                                                                                                                                                                                                                                                WPI; 2004-071741/07.
                                                                                                                                                                                                                                                                                                                                                                                                                     24-JUN-2002; 2002US-0391255P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                        24-JUN-2003; 2003WO-US019966.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WO2004001065-A2
                                                                                                                                                                                                                                                                                                                                                                                      (CORR ) CORNELL RES FOUND INC
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         standard; DNA;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ligand; heat shock factor protein; PCR; primer;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry
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                                                                                                                                                                                          English.
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Pred. No. 1.9e+0
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..9e+03;
0;
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RESULT 2346
ADPO872
XX
AC ADPO872
XX
DT 26-AUG-
XX
DT 10-JU
XX
PN W0200
XX
PN W0200
XX
PN 25-NC
PR 25-NC
PR 24-JI
XX
PR 24-JI
XX
PR 24-JI
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PR 26-NC
PR 26-NC
PR 26-NC
PR 26-NC
PR 26-NC
PR 26-NC
ROTH
CC Or
CC ap
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CC of
ADO80021/
ID ADO8
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AC ADO8
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DT 26-A
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                                                                                             RESULT 2347
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                                                                                                                                                                                                                        Query Match
Best Local :
                                                                                                                                                                                                          Matches
                                                                                                                                                                                                                                                                                                  The invention relates to a novel method for identifying a subject at risk of breast cancer which comprises detecting the presence or absence of one or more polymorphic variations associated with breast cancer in a nucleic acid sample from a subject. The method of the invention has cytostatic applications and may be useful for identifying a risk of breast cancer, as well as therapeutic and prophylactic treatments that specifically target breast cancer, such as gene therapy. The current sequence is that of an Extend primer of the invention which was used to genotype single nucleotide polymorphisms within human glycoprotein VI (platelet) (GP6; GPIV;GPVI) DNA which is located at chromosomal position 19q13.4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Identifying a subject at risk of breast cancer by detecting the presence or absence of one or more nucleotide polymorphic variations, useful for diagnosing, preventing and/or treating breast cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           breast cancer; cytostatic; gene therapy; GPG; GPIV; GPVI; chromosome 19q13.4; ss;
                                                                                                                                                                                                                                                                       Sequence 17 BP; 4 A; 4 C; 5 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             25-NOV-2002; 2002US-0429136P.
24-JUL-2003; 2003US-0490234P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Example 3; Page 83; 286pp; English.
   26-AUG-2004
                               ADO80021;
                                                               AD080021
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                                                                                                                                                                                                          14;
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                                                                                                                                                                                                                           Similarity
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                                                                                                                                                                           GATTACAGGCGTGC 412
                                                               standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Nelson MR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                                                                                                                                          Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
   (first entry)
                                                                                                                                                                                                                         1.4%;
                                                               DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          to genotype human glycoprotein VI polymorphism.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Braun
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                                                                                                                                                                                                          0;
                                                                                                                                                                                                                           Score 14; pred. No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                            Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Kammerer SM,
                                                                                                                                                                                                                                          DB 1;
                                                                                                                                                                                                                         1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            human; platelet glycoprotein VI; PCR; primer; SNP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0;
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                                                                                                                                                                                                                                          Length 17;
                                                                                                                                                                                                            Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Indels
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Centromere autoantigen C1; chromosome 4q12-q13.3; extend; primer;
Homo sapiens.
                                                                             CENPC1 extend primer
                                        Protein C1;
                               88.
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25-NOV-2002; 2002US-0429136P 24-JUL-2003; 2003US-0490234P WPI; 2004-441037/41. Roth 25-NOV-2003; 2003WO-US037943 10-JUN-2004. WO2004047514-A2 Example 6; Page 91; 227pp; English (SEQU-) SEQUENOM INC Nelson MR, Braun P Kammerer MS, Reneland

Identifying a subject at risk of breast cancer by detecting the presence of polymorphic variations in the DLG1, KIAAO783, DPF3 or CENPC1 regions which are associated with breast cancer in a nucleic acid sample from a subject.

The present invention relates to a method for identifying a subject at crisk of breast cancer. The method comprising detecting the presence or comprise of one or more polymorphic variations associated with breast cache acid acid sample from a subject. The nucleic acid sample comprises the DLG1 region (AD079402), KIAA0783 region (AD079403), DPF3 cregion (AD079404) or CENPC1 region (AD079405). The gene DLG1 (discs, region (AD079404) or CENPC1 region (AD079405). The gene bLG1 (discs, region (AD079405) are subject to the gene bLG1 (discs, person, hold or sample composed to chromosomal position 329. The gene KIAA0783 is also known as synapse-associated protein of the gene kIAA0783 is also known as phF14 and pHD finger protein 14. KIAA0783 composed to chromosomal position 7p21.3. The KIAA0783 protein is a novel gene with unknown function, however, being a zinc finger protein, it likely to be a transcription factor. The gene DPF3 (D4, zinc and composed phD fingers, family 3) is also known as CERD4, cer-d4, FLJ14079 and 2810403B03Rik. DPF3 is a Rho family guanine-nucleotide exchange factor. DPF3 has been mapped to chromosomal position 14q24.3-q31.1. The capped composed protein (2) is also known as Centromere composed to chromosomal position 4q12-q13.3. CENPC1 has been mapped to chromosomal position 4q12-q13.3. CENPC1 is a centromere autoantigen and a component of the inner chinetochore size and a timely transition to anaphase. The method is useful for identifying a subject at tisk of breast cancer, to analyze and composed to a breast cancer treatment, and in clinical drug trials. The present sequence was used in an example from the invention.

Sequence 17 BP; 3 A; 4 C; 6 G; 4 T; 0 U; 0 Other;

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             S
                              Matches
                                           Query Match
                                      Local
         691 CTCCCGGGTTCAAG 704
17
                              14;
                                      Similarity
CTCCCGGGTTCAAG 4
                              Conservative
                                      1.4%;
                               <u>0</u>
                                      Score 14;
Pred. No.
                                Mismatches
                                      DB 1; Le
1.9e+03;
                                              Length 17;
                                 Indels
                                0
                                 Gaps
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0

RESULT 2348 ACC84459/c ACC84459 ACC84459 standard; DNA; 42 ΒP

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ACC84454/c
ID ACC844
XX
AC ACC844
XX
DT 28-AUG
DX NTP pe
XX
Cytost
KW Cytost
KW neural
XX
OS Uniden
XX
PN WO2003
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                                                                                                                                                                                                                                                                                                                                    5
                                                                                                                                                                                                                                                      RESULT 2349
                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local S
Matches 23
                                                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention relates to a neural thread protein (NTP) peptide referred to as cell death peptide. Thought to be cytostatic, antibacterial, immunosuppressive and antiinflammatory. It is useful for treating a condition in a patient requiring removal or destruction of cells, for treating a condition such as benign or malignant tumor, inflammatory disease, autoimmune disease and infectious disease. The peptide useful for treatment is derived from the amino acid sequence for a pancreatic thread protein. The peptide is conjugated, linked or bound to a molecule chosen from antibody or its fragment, antibody-like binding molecule, where the molecule has a higher affinity for binding to a tumor or other target than binding to other cells. Treatment using NTP peptides can remove benign tumors with less risk and fewer of the undesirable side effects of surgery. The present sequence is an NTP encoding sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Novel neural thread protein peptide, referred as cell death peptide, useful for treating prostatic hyperplasia, psoriasis, eczema, dermatosis, atherosclerosis, cosmetic modification to skin, throat, mouth, muscle.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        19-JUL-2001; 2001US-0306150P
19-JUL-2001; 2001US-0306161P
16-NOV-2001; 2001US-0331477P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Unidentified
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Cytostatic; Antibacterial; Immunosuppressive; Antiinflammatory; neural thread protein; NTP; tumour; ds.
                                                                                                                                                                                                                     ACC84454 standard; DNA; 60
                                                                                                                                                                                                                                                                                                                                                                                                                                      Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Disclosure; Page 17; 77pp; English.
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     WO2003008443-A2.
                                    Unidentified
                                                                                      Cytostatic;
                                                                                                                   NTP peptide
                                                                                                                                                      28-AUG-2003
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                                                                                                                                                                                                                                                                                                                                      534 CCTCCTGCCTCAGCCTCCCAAGTAGCTGGGACCAAAGA 571
                                                                                                                                                                                                                                                                                                       39
                                                                   atic; Antibacterial; Immunosuppressive; Antiinflammatory;
thread protein; NTP; tumour; ds.
                                                                                                                                                                                                                                                                                                                                                                      l Similarity 60.1
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                                                                                                                                                                                                                                                                                                        CCTGTAGTCCCAGCTACTCAGGAGGCTGGGGCAGGAGA 2
                                                                                                                   encoding sequence #1.
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AAT81185/c
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention relates to a neural thread protein (NTP) peptide referred to as cell death peptide. Thought to be cytostatic, antibacterial, immunosuppressive and antiinflammatory. It is useful for treating a condition in a patient requiring removal or destruction of cells, for treating a condition such as benign or malignant tumor, inflammatory disease, autoimmune disease and infectious disease. The peptide useful for treatment is derived from the amino acid sequence for a pancreatic thread protein. The peptide is conjugated, linked or bound to a molecule chosen from antibody or its fragment, antibody-like binding molecule, where the molecule has a higher affinity for binding to a tumor or other target than binding to other cells. Treatment using NTP peptides can remove benign tumors with less risk and fewer of the undesirable side effects of surgery. The present sequence is an NTP encoding sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19-JUL-2001;
19-JUL-2001;
16-NOV-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Novel neural thread protein peptide, referred as cell death peptide, useful for treating prostatic hyperplasia, psoriasis, eczema, dermatos atherosclerosis, cosmetic modification to skin, throat, mouth, muscle.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 60 BP; 9 A; 21 C; 15 G; 15 T; 0 U; 0 Other;
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                             18-MAY-1994;
13-JAN-1995;
                                                                                                                                                                                                                   Enzymatic nucleic acid; hammerhead; ribozyme; cleavage; human;
smooth muscle cell; hyperproliferation; restenosis; cancer; c-myb;
                                                                                                                                                                                                                                                                Human c-myb hammerhead ribozyme target sequence (nt. position 1246).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Disclosure; Page 15; 77pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2003-247999/24.
P-PSDB; ABR63249.
                                                                                                                                                                     Homo sapiens
                                                                                                                                                                                                    coronary angioplasty; ss.
                                                                                                                                                                                                                                                                                                                                                              AAT81185
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                                                                                                         23-NOV-1995
                                                                                                                                          WO9531541-A2
(RIBO-) RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                        534 CCTCCTGCCTCAGCCTCCCAAGTAGCTGGGACCAAAGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       al Similarity 60.5
23; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                           57
                                                                                                                                                                                                                                                                                                                                                              standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                         CCTGTAGTCCCÁGCTACTCAGGAGGCTGGGGCAGGAGA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           2001US-0306150P.
2001US-0306161P.
2001US-0331477P.
                                                                                                                                                                                                                                                                                               (first entry)
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                             94US-00245466.
95US-00373124.
                                                                            95WO-US006368
                                                                                                                                                                                                                                                                                                                                                             RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    1.4%;
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Pred. No. 1.9e+03;
0; Mismatches 15
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Length 60
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ARTSULT 2351
AAT43035/c
ID AAT4303
XX AAT4303
XX Juvenil
XX Juvenil
XX Microsa
KW Microsa
KW Polymer
XX Synthet
XX Synthet
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             the human c-myb sequence at the base position indicated in the descriptor line. The c-myb sequence was screened for optimal ribozyme target sites using a computer folding algorithm, and regions of the mRNA which did not form secondary folding structures and contained potential ribozyme cleavage sites were identified. Ribozymes were synthesised and their activities optimised by either varying the length of the binding arms or by modification to prevent degradation by nucleases. The ribozymes the c-myb sequence and can be used to prevent smooth muscle cell hyperproliferation in restenosis, especially after coronary angioplasty,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present sequence represents the preferred target sequence for enzymatic nucleic acid, especially a hammerhead ribozyme, which
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Microsatellite; genetic marker; screening; polymerase chain reaction; juvenile glaucon
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAT43035 standard;
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                                                          Detecting pre-disposition to juvenile glaucoma - from presence specific micro:satellite markers on chromosome 1q21q31, also Diregion defined by these markers.
                                                                                                                                                                                                                                                                                                                                                                                                                  18-APR-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  modified_base
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                                                                                                                                                                                  WPI; 1996-485791/48.
                                                                                                                                                                                                                                                                                                (INRM ) INSERM INST NAT SANTE & RECH MEDICALE
                                                                                                                                                                                                                                                                                                                                                       18-APR-1995;
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                                                                                                                                                                                                                                                                                                                                                          95FR-00004590
                                                                                                                                                                                                                                                                                                                                                                                                                  96WO-FR000592
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Location/Qualifiers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      /*tag=
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           /*tag= a
/note= "linked to JOE fluorochrome label"
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Pred. No. 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Ġ
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Predisposition to juvenile glaucoma is detected by characterising the following microsatellite markers on chromosome 1q21q31 associated with occurrence of juvenile glaucoma: afm359yh1, afm22x33, ngal; afm21; afm248wg5; afm278ye5; afm21xb10; afm157xe7 and NGA5. An oligonucleotide primer of the present sequence was used with a primer having the sequence given in AAT43036 to amplify the afm278ye5 marker. Apart from detecting predisposition to disease, the microsatellites should allow localisation, and thus isolation, of the gene involved in juvenile glaucoma
Sequence 17 BP; 4 A; 4 C; 6 G; 3 T; 0 U; 0 Other;
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Best Local
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              961 GGCCAAATCTCGGCTCA 977
                              al Similarity
15; Conserv
17
GGCTCAATCTCGGCTCA 1
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RESULT 2352
AAT85611
                                                                                                                                                               CADASIL; marker; mutation; detection; genotypic diagnosis; chromosome 19; microsatellite; genotyping; subcortical infarct; cerebral autosomal dominant arteriopathy; leukoencephalopathy; ss.
25-JUN-1997.
                                               EP780478-A1
                                                                                                                     Synthetic
                                                                                                                                                                                                                                                              CADASIL mutation detection marker D198841 flanking nucleotide sequence.
                                                                                                                                                                                                                                                                                                                24-FEB-1998
                                                                                                                                                                                                                                                                                                                                                             AAT85611;
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                                                                                            sapiens
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Tournier-Lasserve (INRM) (ASSI-) 21-DEC-1995; 21-DEC-1995; ASSISTANCE INSERM INST NAT SANTE 95EP-00402910 95EP-00402910 M PUBLIQUE. Joute1 Þ gy RECH MEDICALE Bousser M, Bach Ç

Indirect genotypic diagnosis of CADASIL - uses markers genetically linked (within a 2 cM interval) to the mutated gene.

WPI; 1997-322151/30.

Page 5 13pp; English

CC CADASIL (cerebral autosomal dominant arteriopathy with subcortical CC INTACT (cerebral autosomal dominant arteriopathy with subcortical CC infarcts and leukoencephalopathy) for symptomatic or at risk individuals CC or foetuses belonging to a family suspected or known to be affected by CC CADASIL. The method involves the use of markers genetically linked to the mutated gene responsible for CADASIL in order to detect whether or not the tested individual is carrying the chromosome 19 marker alleles that CC have been linked to the disease gene in this given family and to estimate CC his carrier risk, characterised in that the method is based on the CC localisation of the gene in the interval of 2 CM spanned by the flanking CC markers D19S226 and D19S19 and in that one uses at least 2 markers CC located each on one side of the gene. The present sequence represents a CC flanking nucleotide sequence of a new D19S841 marker. The method is used CC Two new microsatellites D19S841 and 11547 have been identified and mapped d by

Example;

Page

7; 25pp; French

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                                                        RESULT 2353
AAX69800
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                                                                                          The present invention describes nucleic acid molecules which modulate th synthesis, expression and/or stability of a mRNA encoding 1 or more receptors of vascular endothelial growth factor (VEGF). A patient (preferably human) having a condition associated with the level of the fms-like tyrosine kinase 1 (flt-1), kinase insert domain containing receptor (KDR) and/or foetal liver kinase 1 (flk-1) (e.g. tumour angiogenesis, ocular diseases, psoriasis and rheumatoid arthritis) can be treated by administering the nucleic acid molecule or the expression vector to the patient. AAK67275 to AAX75752 represent specific examples
                                                                                                                                                                                                                                                             Nucleic acid molecule modulating VEGF receptor(s) gene expression or stability - useful for treating e.g. tumour angiogenesis, psoriasis, rheumatoid arthritis, etc., in a human patient.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Vascular endothelial growth factor receptor; VEGF receptor; flt-1; fl KDR; hammerhead ribozyme; hairpin ribozyme; cleavage; tumour angiogenesis; psoriasis; rheumatoid arthritis; ocular disease; fms-like tyrosine kinase 1; kinase insert domain containing receptor;
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11-JAN-1996;
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96US-00584040.
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14; Mismatches
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                        DB 1;
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AAX70073;

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RESULT 2354
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RESULT 2355
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Best Local S
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11-JAN-1996;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Nucleic acid molecule modulating VEGF receptor(s) gene expression or stability - useful for treating e.g. tumour angiogenesis, psoriasis, rheumatoid arthritis, etc., in a human patient.
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11-JAN-1996;
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                                       KDR; hammerhead ribozyme; hairpin ribozyme; cleavage; tumour angiogenesis; psoriasis; rheumatoid arthritis; ocular disease; fms-like tyrosine kinase 1; kinase insert domain contriction.
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                            foetal liver kinase 1; ss.
                                                                                   Vascular endothelial growth factor receptor; VEGF receptor; flt-1; flk-1;
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96US-00584040.
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                                                                                                                receptor hammerhead ribozyme substrate #1369
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               entry)
                                                                                                                                                                                                                                                                                                                                                1.4%;
                                                                                                                                                                                                                                                                                                                                                                                            2 C; 2 G; 0 T; 12 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Stinchcomb
                                                                                                                                                                                                                                                                                                                                  12;
                                                                                                                                                                                                                                                                                                                                                 Score 13.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                     Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Escobedo
                                                                                                                                                                                                                                                                                                                                                   1.9e+03
                                                                                                                                                                                                                                                                                                                                                                DB 1;
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                                                                                                                                                                                                                                                                                                                                                               Length
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               RESULT 2357
AAX63009
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Nucleic acid molecule modulating VEGF receptor(s) gene expression stability - useful for treating e.g. tumour angiogenesis, psoriasi rheumatoid arthritis, etc., in a human patient.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        01-MAY-1997.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention describes nucleic acid molecules which modulate the synthesis, expression and/or stability of a mRNA encoding 1 or more receptors of vascular endothelial growth factor (NEGF). A patient (preferably human) having a condition associated with the level of the fms-like tyrosine kinase 1 (flt-1), kinase insert domain containing receptor (KDR) and/or foetal liver kinase 1 (flk-1) (e.g. tumour
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           26-OCT-1995;
11-JAN-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             angiogenesis, ocular diseases, psoriasis and rheumatoid arthritis) can l treated by administering the nucleic acid molecule or the expression vector to the patient. AAX67275 to AAX75752 represent specific examples of nucleic acid molecules from the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WO9715662-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 4; Page 88; 218pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 1997-259017/23.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Pavco
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (RIBO-)
(RIBO-)
                                                                                                                                                                                                                                                                                                                                             Maize; corn; Zea mays; delta-9 desaturase; GBSS; target; grannie bound starch synthase; hammerhead ribozyme; hair; modulation; gene expression; transgenic plant; cleavage; caffeine synthesis; coffee plant; nicotine production; to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Delta-9
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        16-JUL-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAX63009;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAX63009 standard; RNA;
                                                                                                                         12-JUL-1996;
                                                                                                                                                                          20-MAR-1997.
                                                                                                                                                                                                                         WO9710328-A2.
                                                                                                                                                                                                                                                                       Zea mays.
                                                                                                                                                                                                                                                                                                                      truit
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     903
                                                                                                                                                                                                                                                                                                                      ripening;
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3; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  RIBOZYME PHARM INC.
CHIRON CORP.
RIBOZYME PHARM INC
DOWELANCO.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                       desaturase hamerhead ribozyme target SEQ ID NO:884.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    UUCACUUUUUGUUUGUU 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TITAATTITTGTTTGTT 919
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    BP; 1 A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           95US-0005974P
96US-00584040
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                                                                           95US-0001135P
                                                                                                                            96WO-US011689
                                                                                                                                                                                                                                                                                                                         flower
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    2 C; 2 G; 0 T;
                                                                                                                                                                                                                                                                                                                      pigmentation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Stinchcomb
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      12;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             쁑
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 13.8;
Pred. No. 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    D
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Escobedo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length
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                                                                                                                                                                                                                                                                                                                                                                                              hairpin
                                                                                                                                                                                                                                                                                                                                                  tobacco;
                                                                                                                                                                                                                                                                                                                                                                          pin ribozyme;
canola plant;
                                                                                                                                                                                                                                                                                                                                                                                                                              substrate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        pression or mRNA psoriasis,
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RESULT 2358
AAX63010
ID AAX6301
XX AAX6301
XX Delta-9
XX Maize;
KW Maize;
KW Granule
KW modulat
KW caffelit
XX
See may
XX Cea may
XX III-JUL-
XX
XX III-JUL-
XX
XX (RIBO-)
PA (DOWC)
XX
PI Zwick P
PI Young S
XX
PI Ribozym
PT Ribozym
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Query Match
Best Local S
Matches 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Delta-9 desaturase. (I) can be used to modulate expression of preferably Delta-9 desaturase or a granule bound starch synthase (GBSS) gene, in a plant (preferably a maize or canola plant). (I) can be used to modulate caffeine synthesis in a coffee plant, nicotine production in a tobacco plant, fruit ripening processes in an apple, tomato, pear, plum or peach plant, flower pigmentation in a rose, petunia, chrysanthemum or marigold plant or lignin production in a tobacco, aspen, poplar or pine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Zwick
Young
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  The present invention describes an enzymatic nucleic acid molecule (I) with RNA cleaving activity, which modulates the expression of a plant gene. Also described is a gene comprising a cDNA sequence encoding maize Delta-9 desaturase. (I) can be used to modulate expression of a gene,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              maize or canola.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Ribozyme which modulates expression of DELTA-9 der
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI; 1997-202224/18.
                                                                                                                                                                                                                                                                       (RIBO-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WO9710328-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            modulation; gene expression; transgenic plant; cleavage; canola plant; caffeine synthesis; coffee plant; nicotine production; tobacco;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         granule
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Delta-9 desaturase hamerhead ribozyme target
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            AAX63010 standard;
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                                                                                                                                                                                                                                                                                                                                                       13-JUL-1995;
                                                                                                                                                                                                                                                                                                                                                                                                      12-JUL-1996;
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                                                                                                                                                                                      SAG
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ripening;
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                                                                                                                                                                                                                                                                    RIBOZYME PHARM INC. DOWELANCO.
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                                                                                                                                                                                      Edington
Folkerts
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Zea mays; delta-9 desaturase; GBSS; target; substrate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         starch
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                                                                                                                                                                                                                                                                                                                                                       95US-0001135P
                                                                                                                                                                                                                                                                                                                                                                                                         96WO-US011689
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                                                                                                                                                                                      0, B
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      o, 85,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    synthase;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              0 C; 1 G; 0 T; 14 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    tes plant gene
desaturase or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      pigmentation;
                                                                                                                                                                                      Mcswiggen
Merlo DJ;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mcswiggen JA,
Merlo DJ;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        14;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               В₽
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pred
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Score 13.8; DB 1
Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      hammerhead
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Mismatches
                                                                                                                                                                                                               JA,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 expression - p
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                                                                                                                                                                                                                  Merlo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DB 1; Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ribozyme;
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                                                                                                                                                                                                                  PAO,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    preferably modulates
d starch synthase in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 hairpin ribozyme;
                                                                                                                                                                                                                  Guo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Guo L,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0
                                                                                                                                                                                                                     Skokut TA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0
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Ribozyme which modulates plant gene expression of DELTA-9 desaturase or maize or canola.

expression - p

preferably modulates und starch synthase in

and mutations

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RESULT 2359
ANV95380/c
ID ANV9538
XX AAV9538
XX AAV9538
XX Human;
KW Human;
KW Gisease
XX Homo sa
XX WO98328
XX ZO-JAN-
PR 23-JAN-
PR 24-DEC-
XX (RIBO-)
XX CRIBO-)
XX Gribozy;
CC The precipicate of to AAV;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       plant
                           ribozymes, respectively, which specifically cleave human c-fos. AAV95261 to AAV95400 and AAV95585 to AAV95628 represent human c-fos target sequences. The enzymatic nucleic acid molecules can be used for treating cancer associated with elevated levels of c-fos oncogene, especially leukaemias, neuroblastomas and lung, breast and colon cancers. The ribozymes may also be used as diagnostic tools to examine genetic drift and mutations within diseased cells, or to detect the presence of c-fos
                                                                                                                                                                                                                               The present invention describes an enzymatic nucleic acid molecule which specifically cleaves RNA derived from a c-fos gene. AAV95401 to AAV95540 and AAV95541 to AAV95584 represent hammerhead ribozymes and hairping.
                                                                                                                                                                                                                                                                                                                                                                                                         Enzymatic nucleic acid molecules which specifically cleave RNA derived from a c-fos gene - useful for treating conditions related to levels of fos, especially cancer.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; c-fos; hammerhead ribozyme; hairpin ribozyme; target site; cancer; oncogene; leukaemia; neuroblastoma; diagnosis; genetic drift; mutation;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AAV95380;
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                                                                                                                                                                                                                                                                                                                                                        Page 51;
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RESULT 2360
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                                                                                                                                  Query Match
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                                                                                                                                                                                                                                                             The present invention describes enzymatic nucleic acid molecules (NAMs) which specifically cleave RNA derived from an epidermal growth factor receptor (EGF-R) gene. AAV97221 to AAV98043 and AAV98097 to AAV99090 represent specifically claimed target sequence from human EGF-R. AAV98067 to V9878 represent hammerhead ribozymes and hairpin ribozymes respectively for human EGF-R. The NAMs are useful for cleaving EGF-R RNA in the treatment of a condition associated with EGFR expression levels e.g. to inhibit cell proliferation in the prevention or treatment of cancers. The NAMs can also be used as diagnostic tools to examine genetic drift and mutations within diseased cells or to detect the presence of EGF-R RNA in a cell
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Enzymatic nucleic acids - which cleave RNA derived from an epidermal growth factor receptor, useful for inhibiting cell proliferation and
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04-DEC-1997;
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                                                                                                            Conservative
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97US-00985162.
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Pred. No. 1.9e+03;
                                                                                                                                     Score 13.8; DB 1; Length 17; Pred. No. 1.9e+03;
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RESULT 2362 AAV95124/c ID AAV9512 XX AC AAV9512

AAV95124 standard; RNA; 17

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AAV95124;

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RESULT 2361
                                                                                                                            ErbB-2 gene. Of these, only oligonucleotides AAV48799-91 resulted in CC significant redcution in ErbB-2 protein expression, while colligonucleotides AAV48792-886 had little effect. The oligonucleotides exemplify the invention. The specification describes oligonucleotides chart contain 8-30 nucleotides, which contain at most 8 nucleotides that contain three hydrogen bonds to cytosine; do not contain four consecutive nucleotides able to form three H-bonds each to four consecutive cytosines; do not contain two sequences of three consecutive cytosines, and the ratio between residues able to form two H-bonds each consecutive cytosines, and the ratio between residues able to form two H-bonds each consecutive collgonucleotides are used to modulate expression of genes, particularly che genes for p53, ErB-2, junB, junD, TGF-beta 1 or beta 2 to control colligonucleotides can also be used to analyse function of proteins (by caltering their expression or activity) and therapeutically, e.g. in cases cof cancer or (targeting TGF) for stimulating the immune system
                                 Matches
                                             Query Match
Best Local &
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Preparation of antisense oligo:nucleotide(s) which lack long runs of consecutive guanosine or inosine - and have specific ratio of residues able to form two or three hydrogen bonds, have greater activity and reduced toxicity, used therapeutically or to modulate growth of cells in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ErbB-2 gene antisense oligonucleotide ErbB-2-N-80
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAV48871;
                                                                                                                                                                                                                                                                                                                                                                                                                       AAV48709-886 represent antisense oligonucleotides directed against the ErbB-2 gene. Of these, only oligonucleotides AAV48709-91 resulted in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Schlingensiepen K,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 31-JAN-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   31-JAN-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    05-AUG-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   EP856579-A1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      krbB-2; antisense oligonucleotide; modulate; gene expression;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         15-OCT-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAV48871 standard; DNA; 17
                                                                                              Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (BIOG-) BIOGNOSTIK GES BIOMOLEKULARE DIAGNOSTIK.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens.
 434
                                 15;
                                                  Similarity
TTTATTTTTTTAAGAC 450
                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Fig 6d; 286pp; English.
                                 Conservative
                                                                                                BP; 10 A; 2 C; 1 G; 4 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 97EP-00101531.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    97EP-00101531.
                                               1.4%;
                                 <u>,</u>
                                                    Pred. No. 1.9e+03
                                                                  Score 13.8;
                                   Mismatches
                                                                    DB 1;
                                   2
                                                                Length
                                   Indels
                                   0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         88
                                   Gaps
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24-FEB-1999

(first entry)

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                                                                                                                                                                                                                                                              RESULT 2363
AAA22733
                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local Similarity
Matches 15; Conser
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             graft rejection; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Human; IL-2 receptor g-chain; interleukin 2 receptor gamma chain; hammerhead ribozyme; hairpin ribozyme; substrate; expression; can autoimmune disease; psoriasis; allergy; inflammatory disease;
Homo sapiens
                                                               Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                             19-JUN-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 4;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Ribozymes targetted to autoimmune disease and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         03-DEC-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         WO9824913-A2
                                      myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                        AAA22733
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present sequence invention describes ribozymes targeted to modulate the synthesis and/or expression of interleukin (IL)-2R gamma encoded RNA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    02-DEC-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               11-JUN-1998
                                                                                                                                                                                                                                                  AAA22733 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      from
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAV94575
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAV93889
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          e.g. s
                                                                                                                                                                                                                                                                                                                                                                                                                                            the present invention. The ribozymes can be used for the treatment e.g. graft rejection, autoimmune disease, cancer, psoriasis, allergy other inflammatory conditions. The ribozymes are also used to induce rance in a recipient to alloantigen from a donor
                                                                                                                                                                                                                                                                                                                                                776
                                                                                                                                                                                                                                                                                                                       17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 IL-2
                                                                                                                                                                                                                                                                                                                                                 ATTTTTAGTAGAGATGG 792
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 to AAV94574 represent specifically claimed ribozymes, and to AAV95260 represent specifically claimed substrate sequ
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Page 46; 61pp; English
                                                                                                                                                                 subunit beta 3 substrate sequence SEQ ID
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  DT,
                                                                                                                                                                                                                                                                                                                                                                                                                                 BP; 6 A; 6 C; 1 G; 0 T; 4 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 receptor
                                                                                                                                                                                                                                                                                                                                                                             Conservative
                                                                                                                                                                                             (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         96US-00758306
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    97WO-US021748
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Mcswiggen JA;
                                                                                                                                                                                                                                                                                                                                                                                        88.2%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                g-chain
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               interleukin
allergies.
                                                                                                                                                                                                                                                   ВP
                                                                                                                                                                                                                                                                                                                                                                           0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 substrate
                                                                                                                                                                                                                                                                                                                                                                                        Score 13.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2 - useful for treating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 position
                                                                                                                                                                                                                                                                                                                                                                                        1.9e+03
                                                                                                                                                                                                                                                                                                                                                                                                     DB 1;
                                                                                                                                                                                                                                                                                                                                                                                                    Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            expression; cancer;
ory disease;
                                                                                                                                                                 NO:5959
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              e.g.
                                                                                                                                                                                                                                                                                                                                                                           0
                                                                                                                                                                                                                                                                                                                                                                          Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               cancer,
                                                                                                                                                                                                                                                                                                                                                                           0
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07-OCT-1999.
Sequence
                                                                                                                                                              The present invention describes enzymatic nucleic acid more cleaving activity, which specifically cleave RNA encoded
                                                                                                                                                                                                                 WPI; 1999-591315/50
                                                                                                                                                                                                                                                         27-MAR-1998;
                                                                                                                                                                                                                                                                     24-MAR-1999;
                                                                                                                                                                                                                                                                                               WO9950403-A2
                   syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu synand other syndromes and diseases related to the levels of ARNT,
                                                                                                                                                                                  54; Page 239; 305pp;
                                                                                                                                                                                                     ribozymes for modulating the synthesis,
                                                                                                                                                                                               mRNA
17 BP; 1 A; 8 C; 3
            subunit alpha-6, or
                                                                                                                                                                                              encoding an angiogenic
                                                                                                                                                                                                                              Roberts E,
                                                                                                                                                                                                                                                         98US-0079678P
                                                                                                                                                                                                                                                                     99WO-US006507
                                                                                                                                                                                                                               Jarvis
                                                                                                                                                                                  English
<u>ი</u>
            integrin subunit beta-3
                                                                                                                                                                                                                              H
0 T; 5 U; 0 Other;
                                                                                                                                                                                                                               Coeshott
                                                                                                                                                                                               factors.
                                                                                                                                                                                                                              Ç
                                                                                                                                                                                                     expression and/or stability
                                                                                                                                                                                                                              Mcswiggen
                                                                                                                                                                      molecules with RNA
                                                                                                                                                               γ̈
                                                                                                                                                               an
                          syndrome,
                                                                                                                                                               ary
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Ś Matches Query Match Best Local Similarity 536 TCCTGCCTCAGCCTCCC 552 Conservative 1.4%; Score 13.8; Pred. No. 1. Mismatches .9e+03 DB 1; Length Indels 0, Gaps

0

뭉 RESULT 2364 AAA22844 AAA22844 standard; RNA; 17 1 UUCUGGCUCAGCCUCCC 17

Integrin subunit beta 3 substrate sequence SEQ ID NO:6070

19-JUN-2000 AAA22844;

(first entry)

Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthrittc; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis age related macular degeneration; inflammation; neovascular glaucoma;

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RESULT 2365
AAA22852
ID AAA2285
XX
AC AAA2285
XY
DT 19-JUN-
XX
DE Integri
XX
KW Human;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CC and AAA19155 to AAA19222 represent their corresponding target sequences; co AAA19235 to AAA19356 and AAA21501 to AAA21595 represent ribozyme co sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and co AAA21596 to AAA21588 represent their corresponding target sequences; co AAA21589 to AAA21688 represent their corresponding target sequences; co AAA21689 to AAA22475 and AAA22363 to AAA23342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362, AAA23343 to AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or complete in the subunit beta-3, integrin subunit alpha-6, or Tie-2. They are conceptably used to treat cancer, diabetic retinopathy, age related comeovascular glaucoma, myopic degeneration, and arrhritis, as well as concevascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, consideration, kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, cand other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or Tie-2 and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and archive the syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6 and archive the syndromes and diseases related to the levels of ARNT.
                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
Best Local
                                                                                                                                                                                                                                                                                                                                                                                                        Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17660 and AAA17623 to AAA17644 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    myopic degeneration; psoriasis; verruca vulgaris; angiofibroma;
tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             07-OCT-1999.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present invention describes enzymatic nucleic acid molecules with RNA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 54; Page 246; 305pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              of an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 1999-591315/50
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              24-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             WO9950403-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Sequence 17 BP; 4 A; 0 C; 4 G; 0 T; 9 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (RIBO-) RIBOZYME PHARM INC.
    Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis;
                                                                                                                                                                                       AAA22852 standard; RNA; 17
                                               Integrin
                                                                                              19-JUN-2000
                                                                                                                                             AAA22852
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                      772
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         ribozymes for modulating the synthesis, \mathsf{mRNA} encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                            _
                                                                                                                                                                                                                                                                                                                                                                                                      Similarity 7; Conserv
                                                                                                                                                                                                                                                                                                                                                           TTGTATTTTAGTAGAG 788
                                                 subunit beta 3
                                                                                                                                                                                                                                                                                                            UUUGAUUUUUAGUAGAG
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Roberts E,
                                                                                                                                                                                                                                                                                                                                                                                                        Conservative
                                                                                              (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               98US-0079678P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 99WO-US006507
                                                                                                                                                                                                                                                                                                                                                                                                                            1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Jarvis T,
                                               substrate sequence SEQ ID NO:6078
                                                                                                                                                                                                                                                                                                            17
                                                                                                                                                                                            ₽P
                                                                                                                                                                                                                                                                                                                                                                                                      8
                                                                                                                                                                                                                                                                                                                                                                                                                              Score 13.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                           Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Coeshott C,
                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       expression and/or stability
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Mcswiggen JA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  Length 17;
                                                                                                                                                                                                                                                                                                                                                                                                           Indels
                                                                                                                                                                                                                                                                                                                                                                                                           0;
                                                                                                                                                                                                                                                                                                                                                                                                           Gaps
                                                                                                                                                                                                                                                                                                                                                                                                           0
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RESULT 2366 AAA22693 ID AAA2269 XX AC AAA2269 XX

AAA22693 standard; RNA;

17

ВP

AAA22693

밁 Ś

_

810 AGGTTGATCTTGATCTC 826

AGGAUGAUCUCGAUCUC

17

Query Match Best Local Matches

10; Conserv

Conservative

5

Indels

0

Gaps

0

1.4%;

Score 13.8; DB 1; Pred. No. 1.9e+03; Mismatches

Sequence 17

BP; 4 A;

4 C; 4 G; 0 T; 5 U;

0 Other; DB 1;

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CC cleaving activity, which specifically cleave RNA encoded by an aryl cc leaving activity, which specifically cleave RNA encoded by an aryl comparison nuclear transporter (ARNT) gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, cc and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their cc corresponding target sequences; AAA17685 to AAA18385 and AAA19086 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18986 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences; CC AAA21689 to AAA21681 and AAA22161 to AAA21595 represent their corresponding target sequences; CC AAA21689 to AAA21681 represent their corresponding target sequences; CC AAA21689 to AAA22475 and AAA23342 represent their corresponding target sequences; CC AAA21682 represent their corresponding target sequences; CC CAA22422 represent their corresponding target sequences. The ribozyme sequence cc for integrin subunit beta 3, and AAA22476 to AAA23422. AAA23343 to AAA3342 represent of their corresponding target sequences. The ribozymes of corresponding target sequences. The ribozyme 
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Novel ribozymes for modulating the synthesis, of an mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss
macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Pavco
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            27-MAR-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   24-MAR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 07-OCT-1999.
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19-JUN-2000

(first entry)

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
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                                                                                                                                                                                                    Sequence 17 BP; 4 A; 0 C; 0 G; 0 T; 13 U; 0 Other;
                                                                                                                                                                                                                                                                                   syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
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                                                429 TTTATTTTATTTTTTT 445
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                                                                                                   Similarity 2; Conserv
UUUAUUUAUUAUUUAU 17
                                                                                                                                                                                                                                                        subunit alpha-6, or integrin subunit beta-3
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                                                                                                      Conservative
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                                                                                                                            1.4%;
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                                                                                                      13,
                                                                                                                         Score 13.8; DB 1;
Pred. No. 1.9e+03;
                                                                                                      Mismatches
                                                                                                                                                    DB 1; Length 17
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RESULT 2367

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428 TTTTATTTTATTTTTTT 444

Query Match Best Local S Matches 2

Local Similarity

11.8%;

1.4%; Score 13.8; DB 1; 11.8%; Pred. No. 1.9e+03;

DB 1; Length 17;

Mismatches

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Gaps

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Sequence 17

BP; 3 A; 0 C; 1 G; 0 T; 13 U; 0 Other;

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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically celeave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17767 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences, AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19155 to AAA1222 represent their corresponding target sequences; AAA17685 to AAA19385 and AAA19087 to CC AAA19233 to AAA21361 and AAA21501 to AAA21595 represent ribozyme gequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21595 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA21675 and AAA23263 to AAA23172 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362 represent ribozymes of the invention are used for modulating the synthesis, expression and/or CC AAA21689 to AAA22475 and AAA23263 to AAA23422 represent ribozymes of the invention are used for modulating the synthesis, expression and/or CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are CC especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, and other syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, CC integrin subunit alpha-6, or integrin subunit bera-3 conductors of AANT, Tie-2, integrin su
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             AAA22688
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Novel ribozymes for modulating the synthesis, expression and/or stability of an mRNA encoding an angiogenic factors.
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                                             integrin subunit alpha-6,
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                                             or integrin subunit beta-3
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AAA22749 standard; RNA; 17 19-JUN-2000 (first entry ₽₽

Integrin subunit beta 3 substrate sequence SEQ ID NO:5975.

ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss. integrin alpha 6 subunit; integrin subunit beta 3; harrpin ribozy
hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic;
ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; P hydrocarbon nuclear uclear transport; ARNT; TIE-2; ang integrin subunit beta 3; hairpin angiogenesis; ribozyme;

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24-MAR-1999; 99WO-US006507

27-MAR-1998; 98US-0079678P

(RIBO-) RIBOZYME PHARM INC.

Jarvis T, Coeshott ú Mcswiggen

WPI; 1999-591315/50

ribozymes for modulating the synthesis, an angiogenic factors. expression and/or stability

English.

CC cleaving activity, which specifically cleave RNA encoded by an aryl compared to the control of the control o The present invention describes enzymatic nucleic acid molecules with RNP syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, subunit alpha-6,

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RESULT 2369 AAA22825 Query Match Best Local & Matches Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatologica; RNA cleavage; cancer; diabetic retinopathy; arthritis age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss AAA22825 standard; RNA; 17 07-OCT-1999. WO9950403-A2 Homo sapiens Integrin subunit beta 3 substrate sequence SEQ ID NO:6051. 19-JUN-2000 (first entry) Pavco (RIBO-) RIBOZYME PHARM INC. 27-MAR-1998; 24-MAR-1999; 777 TTTTAGTAGAGATGGG 793 1 UUUUUAGUAGAGACGCG 17 Similarity 52.9 9; Conservative 99WO-US006507 98US-0079678P 1.4%; Jarvis ВP 6; Score 13.8; Pred. No. 1 Ť, Mismatches Coeshott C, .9e+03; DB Mcswiggen JA; Length 17; 0; 0,

Novel ribozymes for modulating the synthesis, of an mRNA encoding an angiogenic factors. expression and/or stability

Claim 54; Page 244; 305pp; English.

Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specifically cleave RNA encoded by an aryl Crieaving activity, which specific all cleaves RNA encoded by an aryl Crieaving activity, and activity and activity and activity and activity and activity and activities activities and activities and activities and activities activities and activities activities and activities activities and activities as well as especially used to treat cancer, diabetic retinopathy, age related consequence of tuberous cleared account of tuberous schemes, processed and activities as well as especially consequences of tuberous schemes, and archarities, as well as especially consequences of tuberous schemes, and archarities, as well as especially consequences and activities as well as especially consequences and activities as well as especially consequences and activities as well as especially consequences, and activities as well as especially consequences and activities as well as an activities as activities and activities as well as an activities as active active activities and activities as well as an activities and activities a

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AAA22730
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                                                                The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNI) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA1675 to AAA1767 and AAA1766 to AAA1762 represent ribozyme sequences for ARNT, and AAA17168 to AAA17661 to AAA17623 represent tribozyme sequences for ARNT, and AAA17168 to AAA1768 and AAA1768 to AAA18385 and AAA19087 to AAA1914 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21501 to AAA21595 represent ribozyme sequences for Tie-20 and AAA1923 to AAA2168 represent ribozyme sequences; AAA19232 to AAA2168 represent ribozyme sequences; AAA19233 to AAA2168 represent ribozyme sequences; AAA12169 to AAA2168 represent riboryme sequences; AAA2169 to AAA2168 represent ribozyme sequences; AAA2169 to AAA2168 represent riboryme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA3343 to
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                   AAA23422 represent their corresponding target sequences. The ribozymes the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT,
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cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 and AAA19155 to AAA19222 represent their corresponding target sequences; AAA19223 to AAA20361 and AAA21591 to AAA21595 represent ribozyme sequences for integrin alpha 6 subunit, and AAA21362 to AAA21508 and AAA21303 to AAA21303 and AAA21303 to AAA21688 represent their corresponding target sequences; AAA19268 to AAA21475 and AAA21303 to AAA21303 and AAA21304 represent ribozyme sequences for integrin alpha 6 subunit, and AAA21362 to AAA21504 to AAA21475 and AAA21303 to AAA21304 represent ribozyme sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; ss. Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               macular degeneration (ARMD), inflammation, and arthritis, as neovascular glaucoma, myopic degeneration, psoriasis, verruca angiofibroma of tuberous sclerosis, pot-wine stains, sturge w syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu and other syndromes and diseases related to the levels of ARN integrin subunit alpha-6, or integrin subunit beta-3
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                                                                                                                                                                                                                                                                                                                                                                                               The present invention describes enzymatic nucleic acid molecules with RNA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Page 245; 305pp; English
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                                                                                                                                                                                                                                                                                                                                                                                                                                              Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiotibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; 85.

Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; 85.
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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17167 and AAA17661 to AAA17622 represent ribozyme sequences for ARNT, and AAA1768 to AAA17623 to AAA17644 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086

The present cleaving act hydrocarbon

invention describes enzymatic nucleic acid molecules with RNA tivity, which specifically cleave RNA encoded by an aryl nuclear transporter (ARNT) gene, an integrin subunit beta 3

Novel of an

ribozymes for modulating the mRNA encoding an angiogenic f

synthesis, factors.

expression and/or stability

Claim

54; Page

254; 305pp; English

of an

mRNA

encoding

ribozymes for modulating the synthesis,

expression and/or stability

an angiogenic

Claim

54; Page 246; 305pp; English.

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RESULT 2373
AAA22971/c
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                                                                                                                                                                                    Coeshott C,
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Claim 54; Page 236; 305pp; English

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CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA18386 to AAA19086 CC AAA19123 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA20361 and AAA21501 to AAA21555 represent ribozyme cC sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CAAA21598 to AAA21688 represent their corresponding target sequences; CC AAA121689 to AAA22168 represent their corresponding target sequence CC for integrin subunit beta 3, and AAA2376 to AAA23362, AAA23343 to CAAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or CC stability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are cespecially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as correspondent forcome, Kippel-Trenaunay-Weber syndrome, Sturge Weber cC syndrome, Kippel-Trenaunay-Weber syndrome, Soler-Weber-Rendu syndrome, CC and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit beta-3
Novel ribozymes for modulating the synthesis, expression and/or stability of an mRNA encoding an angiogenic factors.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammaton; neovascular glaucoma; myopic degeneration; portiasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber, Rendu syndrome; ss.
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                                                                                                                  WPI; 1999-591315/50.
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Pred. No. 1.9e+03
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                                                                                                                                                                                              Mcswiggen JA;
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AAA22822
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                                                                                                                                                                                                                                                                                                                                                                                Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
                                                                                                                                                                                                                                    07-OCT-1999
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                                                                        (RIBO-) RIBOZYME PHARM INC
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                        Jarvis T,
                        Coeshott
                        'n
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WPI; 1999-591315/50

ribozymes for modulating the synthesis, expression and/or stability

Claim

54;

Page 244; 305pp; English

mRNA encoding

an angiogenic

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AAA22964/c
ID AAA229
XX
AC AAA229
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AC AAA229
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Human;
KW Human;
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Best Local
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                                                                                                                                                                                                                                                                                                                                Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclarosis; pot-wine stain; Sturge Weber syndrome; ss.
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                                                                        24-MAR-1999;
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          27-MAR-1998;
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          98US-0079678P
                                                                           99WO-US006507.
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Pred. No. 1
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2;
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The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC AAA17168 to AAA17561 to AAA17622 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19232 to AAA21921 and AAA21501 to AAA21855 represent ribozyme sequences; CC AAA19232 to AAA21868 represent their corresponding target sequences; CC AAA12892 to AAA22168 and AAA21501 to AAA21595 represent ribozyme and CC AAA21896 to AAA21868 represent their corresponding target sequences; CC AAA21869 to AAA22468 represent their corresponding target sequences; CC AAA21869 to AAA22475 and AAA23263 to AAA23323 represent ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are specially used to treat cancer, diabetic retinopathy, age related corresponding target requences. The ribozymes of meovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, supulcome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit beta-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Novel ribozymes for modulating the synthesis, of an mRNA encoding an angiogenic factors.
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                                          subunit alpha-6, or integrin
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                                                 subunit beta-3
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Query Match
Best Local S
Matches 15
            355
17
                           15;
                                  Similarity
        CTGAGCTCAAGCAGTCC
CTGGGCTCAAGCAATCC 1
                          Conservative
                                  1.4%;
             371
                           0
                                  Score 13.8;
Pred. No. 1.
                             Mismatches
                                   .9e+03;
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                                         Length
                             Indels
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Sequence 17

B₽;

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4 C; 6 G; 0 T; 4 U; 0 Other;

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RESULT 2377
AAA22974/c
AAA22974 standard; RNA; 17
                                                19-JUN-2000
                                                (first entry)
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Integrin subunit beta 3 substrate sequence SEQ ID NO:6200

Human, aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss

WO9950403-A2

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AAA22731
ID AAA;
XX
AC AAA;
AC AAA;
AX Int;
DE Int;
XX Int;
XX
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Best Local Sim.
Matches 15;
                                                                                                                             Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostaic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; age related macular degeneration; inflammation; neovascular glaucoma;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAA21586 to AAA21688 represent their corresponding target sequences; AAA21589 to AAA22475 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to AAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous selerosis, pot-wine stains, Sturge Waber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT.
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                                           myopic degeneration; psoriasis; verruca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Integrin subunit beta 3 substrate sequence
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         syndrome; Osler-Weber-Rendu syndrome; ss
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No. 1.
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The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin albha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17625 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to AAA19154 represent ribozyme sequences for Tie-2, and AAA19386 to AAA19156 co AAA19155 to AAA1222 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19086 co AAA19155 to AAA21361 and AAA21501 to AAA21555 represent ribozyme sequences; AAA17685 represent ribozyme sequences; AAA17685 to AAA21596 to AAA21596 and AAA21591 to AAA21595 represent ribozyme sequences; CC AAA19223 to AAA22163 and AAA21591 to AAA21595 represent ribozyme sequences; CC AAA21689 to AAA21688 represent their corresponding target sequences; CC AAA21689 to AAA22169 and AAA22363 to AAA23422 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to AAA23422 represent their corresponding target sequences. The ribozyme soft the invention are used for modulating the synthesis, expression and/or corresponding target sequences. The ribozyme soft the invention are used for modulating the synthesis, expression and/or corresponding target sequences. They are consistent their corresponding target sequences. They are consistent to the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, reactive sequences, diabetic retinopathy, age related consequences and consequences and arthritis, as well as consequences and other syndrome, observable to the levels of ARNT, Tie-2, integrin subunit alaba-6 or integrin subunit beta-3 or integrin subunit alaba-6 or integri
Sequence
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                                              subunit alpha-6, or integrin subunit beta-3
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BP;
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G; 0 T; 6 U; 0 Other;
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                                    Query Match
Best Local Similarity
Matches 10; Conserv
                  1004 GCGATTCTCCTGTCTCA 1020
GCGAUUCUUCUGGCUCA 17
                                     Conservative
                                             58.8%;
                                     5
                                               Score 13.8;
Pred. No. 1.
                                     Mismatches
                                              1.9e+03
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                                                        Length
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                                     ٥,
                                     Gaps
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RESULT 2379 AAA22738 ID AAA2273 AAA22738 standard; RNA; 17 AAA22738;

19-JUN-2000

(first entry)

Integrin subunit beta 3 substrate sequence SEQ ID NO:5964.

****** Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; anglogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; anglogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antipsoriatic; ARMD;

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AAA22754
ID AAAA
XX
AC AAAA
XX
AC AAAA
XX
DT 19-4
XX
DB Inte
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl C player, an integrin alpha 6 subunit gene, an integrin subunit beta 3 cc gene, an integrin alpha 6 subunit gene, or a fie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, Cc and AAA17168 to AAA17563 and AAA17625 to AAA1684 represent their corresponding target sequences; AAA17685 to AAA18935 and AAA19087 to CC AAA19147 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19155 to AAA19122 represent their corresponding target sequences; CC AAA19223 to AAA21631 and AAA21501 to AAA21505 represent ribozyme sequences; CC AAA21895 to AAA2168 represent their corresponding target sequences; CC AAA21895 to AAA2168 represent their corresponding target sequences; CC AAA21895 to AAA2168 represent their corresponding target sequences; CC AAA21895 to AAA2168 represent their corresponding target sequences; CC AAA21895 to AAA22475 and AAA23263 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA2342 represent ribozyme sequence corresponding target sequences. The ribozyme of the invention are used for modulating the synthesis, expression and/or stability of an mRNA encoding angiogenic factor, especially ARNT, CC especially used to treat cancer, diabetic retinopathy, age related correspondences are conceptable as well as meovascular glaucoma, myopic degeneration, pand arthritis, as well as meovascular glaucoma, myopic degeneration, septiasis, verruca vulgaris, and other syndrome, sclerosis, pot-wine stains, Sturge Weber correspondences and other syndrome, of integrin subunit alpha-6, or integrin subunit alpha-6, or integrin subunit beta-3
                                                                                                                                                                                                                                                                RESULT 2380
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Homo sapiens
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                                                                   19-JUN-2000
                                                                                                                                   AAA22754;
                                                                                                                                                                                                    AAA22754 standard; RNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                     298
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                                                                                                                                                                                                                                                                                                                                                            GGCCGGCUAAUUUUUGU
                                                                   (first entry)
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7; Mismatches
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Integrin

subunit beta 3 substrate sequence SEQ ID NO:5980

AAA22732 ID AAA: XX

AAA22732 standard; RNA; 17

ВP

RESULT 2381

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208

AGGCTGGTCTCGAACTC 224

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The present invention describes enzymatic nucleic acid molecules with RNA cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 cg gene, an integrin alpha 6 subunit gene, or a fie-2 gene. AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17563 and AAA17625 to AAA17684 represent their corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC aAA19184 represent ribozyme sequences for Tie-2, and AAA19087 to CC aAA19125 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA21561 and AAA21501 to AAA21562, and AAA19086 to AAA19223 to AAA21563 and AAA21501 to AAA21555 represent ribozyme sequences; CC AAA21856 to AAA21688 represent their corresponding target sequences; CC AAA21869 to AAA22475 and AAA21501 to AAA21352 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA2362, AAA2343 to CC aAA23422 represent their corresponding target sequences for integrin subunit beta 3, and AAA22476 to AAA2362, AAA2343 to cc abability of an mRNA encoding angiogenic factor, especially ARNT, CC integrin subunit beta 3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as movement of tuberous scherosis, pot-wine stains, Sturge Weber corresponding target sequences, cc and other syndromes and diseases related to the levels of ARNT, Tie-2, and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3
Matches
                                       Best
                                                                      Query Match
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                                                                                                                                             Sequence 17 BP; 2 A; 4 C; 7 G; 0 T; 4 U;
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                                   Local
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                                       Similarity
Conservative
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   4;
                                   Score 13.8; DB 1
Pred. No. 1.9e+03
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AAA22732

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                                                                                                                                                                                                                      The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a fie-2 gene AAA16775 to AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19086 to AAA19155 to AAA19222 represent their corresponding target sequences; AAA19232 to AAA192323 to AAA21501 to AAA21501 to AAA21505 represent ribozyme sequences; CC AAA192323 to AAA22163 and AAA21501 to AAA2155 represent ribozyme sequences; CC AAA192323 to AAA22363 and AAA21501 to AAA2155 represent ribozyme sequences; CC AAA21689 to AAA22168 represent their corresponding target sequences; CC AAA21689 to AAA22165 and AAA2363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA2346 to AAA2342 represent ribozymes of CC AAA21689 to AAA22475 and AAA23263 to AAA2342 represent ribozymes of the invention are used for modulating the synthesis, expression and/or CC AAA21690 to AAA22475 and AAA23263 to AAA2342 represent ribozymes of the invention are used for modulating the synthesis, expression and/or cascular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, CC angiotibroma of tuberous sclerosis, pot-wine stains, Sturge Weber correspondences related to the levels of ARMT, Tie-2, integrin subunit albha-6, or integrin subunit here-2 contested to the levels of ARMT, Tie-2, integrin subunit albha-6, or integrin subunit here-2 contested to the levels of ARMT, Tie-2, integrin subunit albha-6, or integrin subunit here-2 contested to the levels of ARMT.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Human; aryl hydrocarbon nuclear transport; ARNT; TIE-2; angiogenesis; integrin alpha 6 subunit; integrin subunit beta 3; hairpin ribozyme; hammerhead ribozyme; angiogenic factor; cytostatic; antidiabetic; ophthalmologic; antiinflammatory; antiarthritic; antigoriatic; ARND; dermatological; RNA cleavage; cancer; diabetic retinopathy; arthritis; age related macular degeneration; inflammation; neovascular glaucoma; myopic degeneration; psoriasis; vervuca vulgaris; angiofibroma; tuberous sclerosis; pot-wine stain; Sturge Weber syndrome; Kippel-Trenaunay-Weber syndrome; Osler-Weber-Rendu syndrome; ss.
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                                                                                                                                                                     Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 54;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            of an
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                                        1005 CGATTCTCCTGTCTCAG 1021
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                                                                                  . Similarity
                                                                                                                                                                                                                subunit alpha-6,
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llarity 58.8%;
Conservative
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RESULT 2382
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XX AAA2282
XX AAA2282
XX Integri
XX Integri
XX Human,
XW integri
XW Wippel-
XX Wippel-
XX WO99504
XX WPI; 19
XX
                                                                                                                                                                            Crieaving activity, which specifically cleave RNA encoded by an aryl crieaving activity, which specifically cleave RNA encoded by an aryl crieaving activity, which specifically cleave RNA encoded by an aryl crieaving activity, which specifically cleave RNA encoded by an aryl crieaving activity, which specifically cleave RNA encoded by an aryl crieaving activity, which specially cleave RNA encoded by an aryl crieaving activity, which specially cleave RNA encoded by an aryl crieaving activity, which specially cleave RNA encoded by an aryl crieaving activity, and their corresponding target sequences; AAA17681 to AAA1983 and AAA1983 to AAA1985 to AAA19822 represent their corresponding target sequences; Crieaving activity and AAA21961 to AAA21961 to AAA21962 to AAA21962 to AAA21963 and AAA21963 to AAA21968 represent their corresponding target sequences; Crieaving and aAA22475 and AAA22476 to AAA21962, AAA219475 and AAA22475 and AAA22476 to AAA21962, AAA21943 to Crieaving an are used for modulating the synthesis, expression and/or crieaving subunit beta 3, and AAA22476 to AAA2362, AAA23343 to Crieaving activity of an mRNA encoding angiogenic factor, especially ARNT, Crieaving activity activity of an mana encoding angiogenic factor, especially ARNT, Crieaving activities, as well as crieaving activities, as well as angiotibroma of tuberous sclerosis, pot-wine stains, Sturge Weber and archardene constants.
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                                                                                                                     syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu
and other syndromes and diseases related to the levels of ARN
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ribozymes for modulating the synthesis, expression and/or stability mRNA encoding an angiogenic factors.
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                                                                                      subunit beta-3
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Query Match Best Local Similarity

1.4%;

Score 13.8; DB 1; Pred. No. 1.9e+03; 3; Mismatches 2

Indels

0,

Gaps

0

DB 1;

Conservative

Sequence 17 BP; 2 A;

9 C; 2 G; 0 T; 4 U; 0 Other;

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07-OCT-1999 WO9950403-A2 Homo sapiens 24-MAR-1999; 99WO-US006507

27-MAR-1998; 98US-0079678P

PA, Roberts E, Jarvis H Coeshott Ç Mcswiggen

WPI; 1999-591315/50

mRNA ribozymes for encoding modulating the synthesis, an angiogenic expression and/or stability

Claim 54; Page 240; 305pp; English

Creaving activity, which specifically cheave may encoured by an atylocy hydrocarbon nuclear transporter (ARNT) gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, CC and AAA17168 to AAA17560 and AAA17623 to AAA17684 represent their CC corresponding target sequences; AAA17635 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC AAA19155 to AAA19222 represent their corresponding target sequences; CC AAA19223 to AAA21361 and AAA21501 to AAA21555 represent ribozyme cc sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21896 to AAA21688 represent their corresponding target sequences; CC AAA19223 to AAA22169 and AAA2363 to AAA2363 to AAA2362 represent ribozyme cc for integrin subunit beta 3, and AAA2376 to AAA23362, AAA23343 to CC AAA23422 represent their corresponding target sequences; CC AAA214589 to AAA22475 and AAA23263 to AAA23362, AAA23343 to CC atheiity of an mana encoding angiogenic factor, especially ARNT, CC integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are cepically used to treat cancer, diabetic retinopathy, age related CC macular degeneration (ARMD), inflammation, and arthritis, as well as considered to the subcrome sclerosis, pot-wine stains, Sturge Weber CC and other syndromes and diseases related to the levels of ARNT, Tie-2, integrin subunit alpha-6, or integrin subunit beta-3 The present invention describes enzymatic nucleic acid molecules with cleaving activity, which specifically cleave RNA encoded by an aryl RN.

The present invention describes enzymatic nucleic acid molecules with RNA CC cleaving activity, which specifically cleave RNA encoded by an aryl CC hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 CC gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AMA16775 to CC AAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT. CC corresponding target sequences; AAA17685 to AAA18385 and AAA19087 to CC AAA19154 represent ribozyme sequences for Tie-2, and AAA19087 to CC aAA19154 represent ribozyme sequences for Tie-2, and AAA191886 to AAA19086 CC aAA19154 represent tribozyme sequences for Tie-2, and AAA191886 to AAA19086 CC aAA19154 represent adapta 6 subunit, and AAA20362 to AAA21500 and CC sequences for integrin alpha 6 subunit, and AAA20362 to AAA21500 and CC AAA21596 to AAA21688 represent their corresponding target sequences; CC CAA21689 to AAA22475 and AAA23363 to AAA2342 represent ribozyme sequence for integrin subunit beta 3, and AAA22476 to AAA23362 to AAA21500 cc CC for integrin subunit beta 3, and AAA22476 to AAA23262, AAA23343 to CC CAA23422 represent their corresponding target sequences. The ribozymes of the invention are used for modulating the synthesis, expression and/or content of th

myopic degeneration,

Claim 54; Page 246; 305pp; English.

Novel ribozymes for modulating the synthesis,

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expression and/or stability

an mRNA encoding

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The present invention describes enzymatic nucleic acid molecules with RNA cleave RNA encoded by an aryl hydrocarbon nuclear transporter (ARNT) gene, an integrin subunit beta 3 gene, an integrin alpha 6 subunit gene, or a Tie-2 gene. AAA16775 to CAAA17167 and AAA17561 to AAA17622 represent ribozyme sequences for ARNT, Cand AAA17168 to AAA17563 and AAA17683 to AAA17884 represent their Corresponding target sequences; AAA17685 to AAA18385 and AAA19887 to AAA19154 represent ribozyme sequences; AAA17685 to AAA18385 and AAA19887 to AAA19154 represent ribozyme sequences; AAA17685 to AAA18385 and AAA19887 to AAA1988 represent ribozyme sequences; AAA19154 represent ribozyme sequences; AAA19155 to AAA19222 represent their corresponding target sequences; AAA19225 to AAA21925 to AAA21925 to AAA21925 to AAA21936 to AAA21936 to AAA21936 and AAA23363 to AAA21936 to AAA23347 to AAA23475 and AAA23476 to AAA23472, AAA33343 to CAAA23472 represent their corresponding target sequence for integrin subunit beta 3, and AAA23476 to AAA23472, AAA33343 to AAA23472 represent their corresponding target sequence of AAA23422 represent their corresponding target sequence for integrin beta 3, and AAA23476 to AAA23472, AAA33434 to
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Pred. No. 1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          e synthesis, factors.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     'n
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  expression and/or stability
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NT, Tie-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Gaps
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AAV9139
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         និស្សិត្តិស្តី និង្គិន្តិ
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Best Local S
Matches 11
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      22-AUG-1997;
02-OCT-1997;
02-OCT-1997;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          integrin subunit beta-3, integrin subunit alpha-6, or Tie-2. They are especially used to treat cancer, diabetic retinopathy, age related macular degeneration (ARMD), inflammation, and arthritis, as well as neovascular glaucoma, myopic degeneration, psoriasis, verruca vulgaris, angiofibroma of tuberous sclerosis, pot-wine stains, Sturge Weber syndrome, Kippel-Trenaunay-Weber syndrome, Osler-Weber-Rendu syndrome, and other syndromes and diseases related to the levels of ARNT, Tie-2,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human; c-raf; A-raf; B-raf; hammerhead ribozyme; hairpin ribozyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human C-raf target site nucleotide position
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        18-FEB-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        AAV91399;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   AAV91399
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              stability of an mRNA encoding angiogenic factor, especially ARNT,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  05-NOV-1997
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               03-JUL-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         screening;
                                                                                                                                                                                               restenosis, and also new ribozymes and
                                                                                                                                                                                                                     Identifying new catalytic nucleic a generally ribozymes that cleave
                                                                                                                                                                                                                                                                                               WPI; 1999-009494/01
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19-DEC-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            restenosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  target;
                                                                                                                                                                                                                                                                                                                                                                                                                                         (RIBO-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  inflammation;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         684 CCTCTGCCTCCCGGGTT 700
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                                                                                                                                                                                                                                                                                                                                                                                                                                           RIBOZYME PHARM INC.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  substrate;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                      antiviral agents and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      standard;
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                                                                                                                                                                                                                                                                                                                                            Beigelman L, I
J, Workman CT,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                bstrate; catalyst; modulation; expression; Raf gene; delivery; identification; synthesis; deprotection; purification; cancer; on; psoriasis; non-hepatic ascites; infection; genetic drift;
                                                                                                                                                                                                                                                                                                                                                                                            Matulic-Adamic J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Conservative
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97US-0051718P.
97US-0056808P.
97US-0061321P.
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97US-0068212P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      RNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              arthritis;
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Pred.
                                                                                                                                                                        synthons.
                                                                                                                                                                                                                                                                                                                                            Reynolds M, Kisich
ggen JA, Karpeisky I
udry A, Sweedler D;
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e Raf
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No. 1.
                                                                                                                                                                                               that modulates selected processes RNA for treating cancer, modified nucleoside triphosphates
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                9e+03
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                                                                                                                                                                                                                                                                                                                                                                        Burgin
                                                                                                                                                                                                                                                                                                                                                                  Bellon L;
Burgin A;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            <u>,</u>
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A method has been developed for the identification of a nucleic acid capable of modulating a process in a biological system. The method comprises (a) introducing into the system a random library of nucleic acid catalysts (NAC) having a substrate binding domain (SBD), comprising

comprising

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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     a random sequence, and a catalytic domain (CD); and (b) identifying NAC in systems where modulation has occurred and/or determining the sequence of at least part of the SBDs in such systems. Nucleic acid molecules with endonuclease activity and catalytic activity, from the present invention, are used to modulate gene expression in plant and mammalian cells and to cleave target nucleic acid, particularly for treating systemic diseases caused by specific RNA, e.g. cancer, inflammation, psoriasis, non-hepatic ascites and infection. They may also be used to detect genetic drift and mutations in diseased cells and to determine c-raf RNA. Specifically NACs with RNA-cleaving activity that modulate expression of the Raf gene, are with RNA-cleaving activity that modulate expression of the Raf gene, are
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               used to treat cancer, restenosis, psoriasis or rheumatoid arthritis, or generally any condition associated with the level of c-raf. Introduction of sugar/phosphate modifications increases stability against nuclease and activity. AAV90922 to AAV93877 represent NACs that can be used in the method, specifically for modulating the expression of a Raf gene
                                                   This sequence represents a primer of the invention. The invention relates to sequences of at least two nucleotides of formula: (X)m5'-(alpha)n-beta -N3'; or (X)m5'-(gamma)k-delta-N3'; where X = a labelled compound and/or a nucleotide with voluntary sequence; m = 0 or 1; alpha = thymine; n = natural number indicating the repetition of alpha; beta, delta = V or N; V = adenine, guanine or cytosine; N = adenine, guanine or thymine; pamma = thymine; k = natural number of 3 or over indicating the repetition of gamma, in which thymine expressed by gamma is composed of 1/3 or less of adenine, guanine and/or cytosine. The new nucleotides are useful as primers for RT-PCR and determination of base sequences. The new sequences allow for reproductive and highly efficient analysis of gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      JP11032765-A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           RT-PCR
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                                                                                                                                                                                                                                                                  Disclosure; Page 11; 19pp; Japanese.
                                                                                                                                                                                                                                                                                                                     Peptides having at least two new nucleotides - useful as
                                                                                                                                                                                                                                                                                                                                                                                           (TAKI ) TAKARA SHUZO
                                                                                                                                                                                                                                                                                                                                                                                                                              18-JUL-1997;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           primer of the invention
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                                                                                                                                                                                                                                                                                                                                                                                                                                97JP-00208312
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DNA sequence determination;
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Matches Query Match Best Local

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Score 13.8; Pred. No. 1

1.9e+03;

1,

Length 17;

Indels

0;

Gaps

0;

Conservative

.

Mismatches

Sequence

17

BP; 2

A; 0 C; 0

G; 15 T; 0 U;

0 Other;

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RESULT 2388
                C. AAZ36739-41 represent oligo(dT) primers used for modified differential CC display, in the method of the invention. The specification describes a CC method for measuring the level of two or more nucleic acid molecules in a CC target. The method comprises contacting a probe with an arbitrarily or CC statistically sampled target and detecting a probe with an arbitrarily or CC enterentially expressed nucleic acid molecules associated with disease CC differentially expressed nucleic acid molecules associated with disease CC extensively the methods can be used to identify CC developmental disorder, proliferative disorder or neurological disorder. CC elementially the methods can be used to assess the efficacy or toxicity of or a resistance to a treatment. Also the methods can be used to determine differential expression of nucleic acid molecules in response to a stimulus, e.g. a chemical, drug or growth factor (especially CC epidermal growth factor), radiation, stress or a pathogen. The methods CC can also be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can be used to determine co-regulated genes that can be potential CC can also be used to determine co-regulated genes that can be potential CC can be used to determine co-regulated genes that can be contacted to determine co-regulated
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Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Stimulus-regulated nucleic acid; sequence profile; nucleic acid level; differentially expressed nucleic acid; disease state; cancer; autoimmune disease; infectious disease; aging; developmental disorder; proliferative disorder; neurological disorder; toxicity; primer; treatment resistance; differential expression; drug discovery; growth factor; epidermal growth factor; radiation; stress; pathogen; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         27-APR-1998;
27-AUG-1998;
04-FEB-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Anchored oligo(dT) primer ATISA used for modified differential display.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAZ36739;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  WPI;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Synthetic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAZ36739 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Example 3; Page 91; 187pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Measuring expression of low abundance reduced complexity target nucleic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Mcclelland M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        27-APR-1999;
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targets
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        431 TATTTTATTTTTTTAA 447
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
        gurb
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98US-0098070P.
99US-0118624P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Welsh
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        99WO-US009119.
        discovery
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.4%;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Trenkle T;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ВP
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Pred. No. 1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Indels
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              TTTTATTTTATTTTTT 444
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Query Match Best Local S Matches 15

Local Similarity les 15; Conserv

Conservative

1.4%;

Score 13.8; DB 1; Pred. No. 1.9e+03; 0; Mismatches 2

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Length 17; Indels

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Gaps

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765

AATTTTTTTTTTTTTT AATCTCTTTGTATTTTT 17

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                                                                                               The present invention describes nucleic acids (A) that interact stably CC with a target sequence and contain at least one phosphoro(di)thioate CC link, having endonuclease activity. (A), and more generally any catalytic nucleic acid (A) that modulates expression of the oestrogen receptor CC gene, are used to treat cancer (particularly of breast or endometrium), CC in vivo or by transforming cells ex vivo and implanting treated cells, or CC gecause of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, CC particularly for identification of therapeutic targets, and as research CC reagents (for RNA, in the same way that restriction endonucleases are CC used with DNA). The combination of modifications in (A) improves CC resistance to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent oestrogen receptor hammerhead ribozyme sequences, and CC AAA24748 to AAA25992 represent their corresponding target sequences. CC AAA25993 to AAA26107 to AAA26218 represent their corresponding target sequences. AAA26219 to AAA26218 represent other ribozyme sequences and CC antisense oligonucleotides used in the exemplification of the present CC invention
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Matches
               Query Match
Best Local (
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WPI; 2000-013248/01.
                                                           Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                  Claim 77;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  used to treat cancer.
                                                                                                                                                                                                                                                                                                                                                                                                                                                               New nucleic acids that interact, and optionally cleave, target sequences,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Thompson JD, Reynolds M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     20-APR-1998;
23-JUN-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Oestrogen receptor hammerhead ribozyme target sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    19-JUL-2000
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAA25450 standard;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          anticancer; breast cancer; endometrium cancer; ss
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       hammerhead ribozyme; hairpin ribozyme; antisense oligonucleotide;
gene expression modification; cancer; phosphorothioate; endonuclease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Oestrogen receptor; c-raf; k-ras; bcl-2; ribozyme; cleavage;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (RIBO-) RIBOZYME PHARM INC
              Local
1 Similarity
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ATTTTTTTTTTTTTA 17
                                                                                                                                                                                                                                                                                                                                                                                                                 Page 79; 148pp; English
                                                            BP; 0 A;
 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Zwick M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     98US-0082404P.
98US-00103636.
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            1.4%;
                                                            0 C; 0
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/is T, Woolf T,
                                                            G; 17 T; 0 U; 0 Other;
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               Score 13.8;
Pred. No. 1.
Mismatches
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ID AAA2
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                                                                                        for other conditions associated with levels of osetrogen receptor.

Because of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, particularly for identification of therapeutic targets, and as research reagents (for RNA, in the same way that restriction endonucleases are used with DNA). The combination of modifications in (A) improves resistance to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent osetrogen receptor hammerhead ribozyme sequences, and AAA24748 to AAA25092 represent their corresponding target sequences. and AAA26107 to AAAA2610 represent their corresponding target sequences. AAA26107 to AAAA2617 represent their corresponding target sequences and AAA26107 to AAAA2617 represent their corresponding target sequences and aAA26107 to AAAA2617 represent their corresponding target sequences and aAA26107 to AAAA2617 represent their corresponding target sequences and accordance of the present their corresponding target sequences.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          with a target sequence and contain at least one phosphoro(di)thioate link, having endonuclease activity. (A), and more generally any catalytic nucleic acid (A') that modulates expression of the oestrogen receptor gene, are used to treat cancer (particularly of breast or endometrium), in vivo or by transforming cells ex vivo and implanting treated cells, or
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Thompson JD, Reynolds M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (RIBO-) RIBOZYME PHARM INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               20-APR-1998;
23-JUN-1998;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        hammerhead ribozyme; hairpin ribozyme; antisense oligonucleotide; gene expression modification; cancer; phosphorothioate; endonuclease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Oestrogen receptor hammerhead ribozyme target sequence SEQ ID NO:2098.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAA25600;
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Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 77; Page 84; 148pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2000-013248/01.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Matulic-Adamic
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           28-OCT-1999
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         anticancer; breast cancer; endometrium cancer; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         19-JUL-2000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The present invention describes nucleic acids (A) that interact stably
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 used
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New nucleic acids that interact,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          19-APR-1999;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO9954459-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 to treat cancer.
      B₽;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Zwick M,
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98US-00103636.
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      3 A;
      2 C;
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Jarvis T, Woolf T,
      1 G;
          11
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      T; 0 U;
      0 Other;
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Haeberli
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RESULT 2391
AAA25178
                                                                                                                            The present invention describes nucleic acids (A) that interact stably contain at least one phosphoro(di)thioate contain, having endonuclease activity. (A), and more generally any catalytic conclusion and (A) that modulates expression of the osstrogen receptor conclusion and the surpression of the osstrogen receptor convivo or by transforming cells ex vivo and implanting treated cells, or correlate inhibition of gene expression with alterations in phenotype, correlate inhibition of gene expression with alterations in phenotype, correlate (for RNA, in the same way that restriction endonucleases are consistence to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent oestrogen receptor hammerhead ribozyme sequences, and AAA25992 represent their corresponding target sequences. AAA26107 to AAA26271 represent their corresponding target sequences and cantisense oligonucleotides used in the exemplification of the present corresponding target sequences and cantisense oligonucleotides used in the exemplification of the present corresponding target in the present corresponding target sequences. AAA26219 to AAA26271 represent other ribozyme sequences and cantisense oligonucleotides used in the exemplification of the present corresponding target in the present of the present corresponding target sequences.
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                                                                             Query Match
Best Local
                                                              Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               used to treat cancer.
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                                                                                                                            Sequence 17 BP; 2
                             591
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Н
                                                                             Similarity
                             CTAATTTTTATTTTAT 607
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CTGATTTTTGTTTTAT 17
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98US-00103636.
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                                                                                                                            A; 1 C; 2 G; 12 T; 0 U; 0 Other;
                                                                           1.4%;
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                                                              Score 13.8; D
Pred. No. 1.9e
0; Mismatches
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ls T, Woolf T,
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                                                                               1.9e+03;
                                                                                             DB 1; Length 17;
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Haeberli
                                                                 Indels
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RESULT 2392 AAA25603

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AAA25444 standard; DNA; 17

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RESULT 2393

AAA25444

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                                                                 Matches
                                                                                                  Query Match
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Reynolds M, Zwick
Matulic-Adamic J;
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23-JUN-1998;
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                                                                                                                                   Sequence 17
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                                                                                  Local
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                                771 TTTGTATTTTAGTAGA 787
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ب
                                                                                   Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Page 84; 148pp; English.
                                                                                                                                     BP; 3 A; 1 C; 2 G; 11 T; 0 U; 0 Other;
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Zwick M, Jar
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                                                                 Conservative
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98US-00103636
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                                                                                1.4%;
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Jarvis T, Woolf T,
 17
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                                                                                  Score 13.8; DB 1; Length 17; Pred. No. 1.9e+03;
                                                                   Mismatches
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Haeberli P;
                                                                       Indels
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AAA25444;

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AAA25445
ID AAA2
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                                                                                RESULT 2394
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Best Local S
Matches 15
                 AAA25445
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23-JUN-1998;
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                                                 AAA25445 standard; DNA; 17
                                                                                                                                                                                                                                                               Sequence 17
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                                                                                                                                                                                                               Similarity
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98US-00103636
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is T, Woolf T,
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                                                                                                                                                                                                               Score 13.8;
Pred. No. 1.
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                                                                                                                                                                                                               1.9e+03;
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Haeberli
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SAXAXE

AAA98232; AAA98232

standard;

DNA; 17

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30-JAN-2001

(first entry)

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AAA98232
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                                                                                                                                                                                                                                                                                      CC gene, are used to treat cancer (particularly of breast or endometrium).

CC in vivo or by transforming cells ex vivo and implanting treated cells, or CC for other conditions associated with levels of cestrogen receptor.

CC Because of the high selectivity for targeted RNA, (A) can also be used to correlate inhibition of gene expression with alterations in phenotype, CC particularly for identification of therapeutic targets, and as research CC reagents (for RNA, in the same way that restriction endonucleases are CC used with DNA). The combination of modifications in (A) improves CC resistance to nucleases, binding affinity and/or activity. AAA23503 to AAA24747 represent oestrogen receptor hammerhead ribozyme sequences, and CC AAA24747 represent costrogen receptor hairpin ribozyme sequences.

CC AAA24748 to AAA25092 represent their corresponding target sequences. CC Gequences, and AAA26107 to AAA26218 represent their corresponding target sequences and AAA26219 to AAA26271 represent other ribozyme sequences and cantisense oligonucleotides used in the exemplification of the present corresponding target sequences and contisense oligonucleotides used in the exemplification of the present corresponding target sequences.
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The present invention describes nucleic acids (A) that interact stably with a target sequence and contain at least one phosphoro(di)thioate link, having endonuclease activity. (A), and more generally any catalytic nucleic acid (A') that modulates expression of the oestrogen receptor.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     New nucleic acids that interact, and optionally cleave, target sequences,
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23-JUN-1998;
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                                                                                                                                                                                                                                         Sequence 17 BP; 1 A; 0 C; 1 G; 15 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Claim 77; Page 79; 148pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   used to treat cancer.
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                                                                                                                     TTTATTTTATTTTTTT 445
                                                                                                                                                            Conservative
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98US-00103636.
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is T, Woolf T,
                                                                                                                                                                                  Pred. No.
                                                                                                                                                                                                   Score 13.8; DB 1; Length 17;
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Haeberli
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RESULT 2396
AAA50197
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DE 2'-Meth
                                                                                                                                                                                                                                                                                                                                                                       This invention describes a novel retroviral expression vector (A) CC containing DNA sequences (I) for packaging vector RNA and for cell-containing DNA sequences of proteins or peptides encoding by heterologous DNA CC (II). The sequences controlling cell-specific expression contain a cell-specific expression vector size and experience. The invention also describes (a) mRNA and CC RNA of (A); (b) prokaryotic and eukaryotic cells containing (A); (c) CC eukaryotic cells containing (A) in integrated form; (d) virions (CC containing a retroviral expression vector RNA derived from (A); (e) a CC method for producing the virions of (d); (f) a method for incorporating (CC protein-encoding nucleic acid sequences into a eukaryotic cell by (CC containing (A) and a packaging cell line, that contains at least one (CC containing (A) and a packaging cell line, that contains at least one (CC proteins of (A). (A) are used for cell- or tissue-specific expression of (CC foreign genes for gene therapy and to produce virions for introducing (CC proteins within the U3-R segment, but without their disadvantages (excessive strength and limited cell specificity). Since (A) are derived from endogenous (harmless) viral sequences, they do not introduce any new (viral sequences) into the converse and veccombination of introduce any new (viral sequences) that proceed the form of the forms and veccombination.
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                                                                                                                                                                                                                                                                                                                                                                                                          viral sequences into the genome and recombination will not create new types of retrovirus. The promoters provide cell or tissue specific expression, according to which HERV they are derived from
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Retroviral expression vector, useful in gene therapy, contains a promoter from a human endogenous retrovirus to provide cell-specific expression.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Cell-specific expression; tissue-specific expression; gene therapy; LTR, U3-R segment; long terminal repeat; retroviral expression vector;
                                                                                                                                                                                                                                                                                                                                                                       Sequence 17 BP; 0 A; 0 C; 0 G; 17 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Disclosure; Page 27; 67pp;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 WPI; 2000-587442/55
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Leib-Moesch C,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            09-MAR-2000; 2000WO-EP002064
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human retrovirus HERV LTR PCR primer
2'-Methoxyethoxy-modified phosphorothioate oligonucleotide
                                      07-NOV-2000
                                                                             AAA50197;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               (GSFU-) GSF FORSCHUNGSZENTRUM UMWELT & GESUNDHEI.
                                                                                                                    AAA50197 standard; DNA; 17
                                                                                                                                                                                                                                                       428
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                                                                                                                                                                                                                                                                                                              Similarity
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                                        (first entry)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 retrovirus.
                                                                                                                                                                                                                                                                                                                88.2%;
                                                                                                                    ВP
                                                                                                                                                                                                                                                                                            Score 13.8; DB 1; Length 17; Pred. No. 1.9e+03; o; Mismatches 2; Indels
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AAF05509

AAF05509 standard; DNA;

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The present sequence is that of a phosphorothioate oligonucleotide CC containing 20 T nucleobases, each having a 2'-methoxyethoxy group on its CC irribosyl sugar moiety. It is an example of an oligomeric compound CC produced according to the methods of the invention. The invention CC provides compounds and methods for the preparation of mixed backbone CC oligomeric, or chimeric, compounds having phosphodiester internucleoside linkages. The methods also include incorporation of CC phosphonate internucleoside linkages. The methods also include incorporation of CC phosphonate internucleoside linkages. The methods also include incorporation of CC contiguous region is subsequently oxidized to phosphodiester, CC linkages prior to further elongation. Mixed backbone oligomeric compounds CC linkages prior to further elongation. Mixed backbone oligomeric compounds CC linkages prior to further by oxidizing adjacent regions with different care prepared in this manner by oxidizing adjacent regions with different coxidation steps that oxidize a region of 1 or more H-phosphonate internucleoside linkages without degrading existing linkages that have been previously oxidized. The oligomucleotides obtained are useful as primers in PCR, probes, linkers, gene fragments and for other diagnostic cand an antiviral acontral acon
                                                                                                                                        Query Match
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Matches 15
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                                                                                                                                                                                                                                                                                                                                             primers in PCR, probes, linkers, tests on e.g. biological tissue, and as antiviral agents
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Preparation of mixed backbone oligomeric compounds useful as e.g. primers for diagnostic tests, involves oxidation of H-phosphonate internucleoside linkages to phosphodiester internucleoside linkages.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Manoharan M,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               11-FEB-2000; 2000WO-US003543
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                                                                                                                                                                                                                                                                                Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Example 12; Page 34; 49pp; English.
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μ.
                                                                                                                                        l Similarity 88.2
15; Conservative
                                             TTTTATTTTATTTTTTT 444
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                                                                                                                                                                                                                                                                                BP; 0 A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Maier MA
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1. .17
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                                                                                                                                            0;
                                                                                                                                                                              Score 13.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                        17 T; 0 U; 0 Other;
                                                                                                                                               Mismatches
                                                                                                                                                                                  1.9e+03
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                                                                                                                                                                                                                DB 1;
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16-FEB-2001

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RESULT 2398
AAF05510
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AC AAF0551
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Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, ERR3/COUP-TF-1, the GARA transcription factor gene, IRF-2 and/or the CAATT Displacement protein (CDP). Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of erythropojetin, granulocyte colony stimulating factor protein and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Ribozyme; erythropoietin; granulocyte colony stimulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Hammerhead ribozyme
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor prointerferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Homo
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       19-OCT-2000
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                                                      12-APR-1999;
                                                                                                                                                                                                                                                                                                         Ribozyme; erythropoietin; granulocyte colony interferon alpha; ss.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       AAF05510 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Claim 18;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 12-APR-1999;
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       (RIBO-) RIBOZYME.PHARM INC
                                                                                                        11-APR-2000; 2000WO-US009721
                                                                                                                                                                                                        WO200061729-A2
                                                                                                                                                                                                                                                       Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                  Hammerhead ribozyme substrate #2729.
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No. 1
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RESULT 2399
AAF06381
ID AAF0638
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DT 16-FEB-
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Best Local Similarity
Matches 15; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP). Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production erythropoietin, granulocyte colony stimulating factor protein and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                The present invention relates to enzymatic and antisense nucleic acid molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EARJ/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Blatt
                                                                                                                  Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
                                                                                                                                                                                                                                                                                                                                                                                                 Hammerhead ribozyme substrate #3178.
                                                                                                                                                                                                                                                                                                                                                                                                                                               AAF06381;
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                                                                                            Claim 42; Page 128; 164pp; English.
                                                                                                                                                                                         Blatt L,
                                                                                                                                                                                                                                                                11-APR-2000; 2000WO-US009721
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                                                                                                                                                                                                                                                                                                                                                                        Ribozyme;
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                                                                                                                                                                 WPI; 2000-647423/62
                                                                                                                                                                                                                                        12-APR-1999;
                                                                                                                                                                                                                                                                                                                                     Homo sapiens.
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molecules that act as inhibitors of the expression of repressor genes encoding the TR2 Orphan receptor, EARJ/COUP-TF-1, the GATA transcription factor gene, IRF-2 and/or the CAATT Displacement Protein (CDP). Inhibition of the repressors removes prevents inhibition (and consequently increases expression of) genes involved in the production of

The present invention relates to enzymatic and antisense nucleic acid

erythropoietin,

granulocyte

colony stimulating

genes involved in the production imulating factor protein and

Of

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                                                                                                                                                                                                                                                                                                   Enzymatic and antisense nucleic acid inhibition of repressor genes, useful for producing e.g. granulocyte colony stimulating factor protein, interferon alpha and erythropoietin.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Ribozyme; erythropoietin; granulocyte colony stimulating factor;
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                                                                                                                                                             Sequence
                                                                                                                                                                                                                                                                                 Claim 18; Page 117; 164pp; English.
                                                                                                                                                                                                                                                                                                                                               WPI; 2000-647423/62.
  ABK00892
                       ABK00892 standard;
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                                                                                                                             Local Similarity
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2; Conserv
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                                                                                                                   Conservative
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                       В₽
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Pred. No. 1.9e+03;
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Pred. No. 1.9e+03;
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Human
                                  12-MAR-2002 (first entry)
NOGO Inozyme #162.
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creuroprotective; nootropic; neuroprotective; antiparkinsonian; muscular; CD20; neurite growth inhibitor gene; MCGO; hammerhead ribozyme DNAzyme; inozyme; G-cleaver; amberzyme; zinzyme; lymphoma; leukaemia; B-cell lymphoma; non-Hodgkin's lymphoma; NHL; lymphoma; leukaemia; human immunodeficiency virus; HV associated NHL; mantle-cell lymphoma; MCL; immunocytoma; IMC; immune thrombocytopaenia; stroke; dementia; inflammatory arthropathy; central nervous System injury; cerebrovascular accident; CVA, Alzheimer's disease; multiple sclerosis; chemotherapy-induced neuropathy; amyotrophic lateral sclerosis; ALS; parkinson's disease; ataxia; Huntington's disease; Creutzfeldt-Jakob disease; muscular dystrophy; neurodegenerative disease Homo sapiens. Synthetic. dystrophy; neurodegenerative disease ribozyme;

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11-FEB-2000;
28-FEB-2000;
06-MAR-2000;
                                                                                                                                                                 09-FEB-2001; 2001WO-US004273
WPI; 2001-607195/69.
                         Blatt L,
                                                              (RIBO-)
(BLAT/)
(MCSW/)
                                                                                                                                                                                           16-AUG-2001.
                                                                                                                                                                                                                    WO200159103-A2
                                                (CHOW/)
                                                            RIBOZYME PHARM INC.
BLATT L.
MCSWIGGEN J.
                                                  CHOWRIRA B
                         Mcswiggen J,
                                                                                                                ; 2000US-0181797P.
; 2000US-0185516P.
; 2000US-0187128P.
                           Chowrira
                           묤,
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Nucleic acid molecules, e.g., enzymatic nucleic acids and antisense constructs, which down regulate expression of a CD20 gene or neurite growth inhibitor gene useful for treating, e.g., lymphoma, leukemia, nervous system injury. and

Claim 88; Page 80; 200pp; English.

The invention relates to a nucleic acid molecule which down regulates expression of a CD20 gene and a nucleic acid molecule which down cregulates expression of a neurite growth inhibitor gene (NOGO). The nucleic acids may be enzymatic nucleic acids (e.g. a ribozyme or a consistency an Inozyme (an endolytic nucleic acid cleaving an RNA molecule possessing an NCH motif), a G-cleaver (cleaving RNA with a NYM motif) processing an NCH motif), a G-cleaver (cleaving RNA with a NYM motif) process of CD20 in the presence of a divalent cation that is preferably Mg^2+. CC furthermore, it may be contacted with a call to reduce CD20 activity of the cell and treat a patient having a condition associated with the level of CD20. The treatment may further comprise the use of one or more treat lymphoma, leukaemia, B-cell lymphoma, low-grade or follicular non-cc treat lymphoma (NHI), bulky low-grade or follicular NHI, lymphocytic leukaemia, HIV (human immunodeficiency virus) associated NHI, mantle-cell lymphoma (NCI), immunocytoma (INC), small B-cell lymphocytic lymphoma (LC), immunocytoma (INC), small B-cell lymphocytic lymphoma (LC), immunocytoma (INC), small B-cell lymphocytic lymphoma, leukaemia, and inflammatory arthropathy. The NOGO-crayetting nucleic acid may be contacted with a cell to reduce NOGO gene in the coll and treat a patient having a condition associated with the level of coll and treat a patient having a condition associated with the level of therapies. In particular, the NOGO-targetting nucleic acid may be used to treat central nervous system (CNS) injury and cerebrovascular accident collection, at rocke), Alvheimer's disease. Jementia. multiple aclerosis (MS). (CVA, stroke), Alzheimer's disease,

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RESULT 2402
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AC Human N
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Human 1
XW Cerebro
XW Inflamm
XW Inflamm
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The invention relates to a nucleic acid molecule which down regulates expression of a CD20 gene and a nucleic acid molecule which down regulates expression of a neurite growth inhibitor gene (NOGO). The nucleic acids may be enzymatic nucleic acids (e.g. a ribozyme or a
                                                                                                                                                                                                                                   Nucleic acid molecules, e.g., enzymatic nucleic acids and antisense constructs, which down regulate expression of a CD20 gene or neurite growth inhibitor gene useful for treating, e.g., lymphoma, leukemia,
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28-FEB-2000; 2000US-0185516P
06-MAR-2000; 2000US-0187128P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   (RIBO-) RIBOZYME PHARM (BLAT/) BLATT L. (MCSW/) MCSWIGGEN J.
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CHOWRIRA B N
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Pred. No. 1.9e+03;
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CC DNAzyme) an Inozyme (an endolytic nucleic acid cleaving a an RNA molecule CC possessing an NCH motif), a G-cleaver (cleaving RNA with a NYN motif) pr CC an amberzyme (cleaving RNA with an NGN triplet), a zinzyme (cleaving RNA CC with a YGY motif). The CD20-targetting nucleic acid is used to cleave RNA CC with a YGY motif). The CD20-targetting nucleic acid is used to cleave RNA CC of CD20 in the presence of a divalent cation that is preferably Mg^2^+. CC furthermore, it may be contacted with a cell to reduce CD20 activity of the cell and treat a patient having a condition associated with the level of CD20. The treatment may further comprise the use of one or more CC treat lymphoma (NHI), bulky low-grade or follicular non-CC leukaemia, HIV (human immunodeficiency virus) associated NHI, lymphocytic lymphoma, (NCI), immunocytoma (INC), small B-cell lymphocytic lymphoma, (NCI), immunocytoma (INC), small B-cell lymphocytic lymphoma, immunocytoma (INC), small B-cell lymphocytic lymphoma, cell card may contacted with a cell to reduce NCOO gene in the CC targetting nucleic acid is used to cleave RNA of the NCOO gene in the CC therapies. In particular, the NCOO-targetting nucleic acid may be used to cleave RNA of the NCOO activity of the CC therapies. In particular, the NCOO-targetting nucleic acid may be used to creat central nervous system (CNS) injury and cerebrovascular accident (CNA, stroke), Alzheimer's disease, dementia, multiple sclerosis (MS), C chemotherapy-induced neuropathy, amyotrophic lateral sclerosis (MS), C chemotherapy-induced neuropathy, and/or other neurodegenerative disease (C sements high respond to the modulation of NCOO expression. The present caters which respond to the modulation of NCOO expression. The present
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Sequence 17 BP; 0 A; 11 C; 4 G; 0 T; 2 U; 0 Other;

δ Matches Query Match Best Local (Local Similarity 241 CCTCCGTCTCGGCCTCC 257 Conservative 76.5%; 2 Score 13.8; DB 1; Pred. No. 1.9e+03; Mismatches Length 17; Indels 0 Gaps 0

ABK00089 standard; (first entry) RNA;

Human; ss; antisense therapy; cytostatic; antiinflammatory; haemostatic; cerebroprotective; nootropic; neuroprotective; antiparkinsonian; muscular; CD20; neurite growth inhibitor gene; NGG0; hammerhead ribozyme; NMazyme; inozyme; G-cleaver; amberzyme; zinzyme; lymphoma; leukaemia; B-cell lymphoma; non-Hodgkin's lymphoma; NHL; lymphocytic leukaemia; human immunodeficiency virus; HHV associated NHL; mantle-cell lymphoma; NCL; immunocytoma; IMC; immune thrombocytopaenia; stroke; dementia; inflammatory arthropathy; central nervous system injury; cerebrovascular accident; CVA; Alzheimer's disease; multiple sclerosis; chemotherapy-induced neuropathy; amyotrophic lateral sclerosis; ALS; parkinson's disease; ataxia; Huntington's disease; Creutzfeldt-Jakob Human NOGO Hammerhead Ribozyme #89. disease; muscular neurodegenerative disease

Homo sapiens. Synthetic.

09-FEB-2001; 2001WO-US004273

11-FEB-2000; 2000US-0181797P. 28-FEB-2000; 2000US-0185516P.

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RESULT 2404
ABK00237/c
ID ABK0023
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AC ABK0023
XC ABK0023
XX
DT 12-MAR-
XX
DE Human N
XX
KW Human;
KW Cerebro
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Crespression of a CD20 gene and a nucleic acid molecule which down regulates cregulates expression of a CD20 gene and a nucleic acid molecule which down conclude acids may be enzymatic nucleic acids (e.g. a ribozyme or a conclusion and in the presence of a foreign carids (e.g. a ribozyme). The CD DNAzyme) an Inozyme (an endolytic nucleic acid cleaving an RNA molecule conclusion and the presence of a divalent carid cleaving RNA with a NGN triplet), a zinzyme (cleaving RNA continuity) and continuity of the cell and treat a patient having a condition associated with the level of CD20 in the presence of a divalent carin that is preferably M9^2+.

CC Furthermore, it may be contacted with a cell to reduce CD20 activity of the cell and treat a patient having a condition associated with the level of CD20. The treatment may further comprise the use of one or more considering limits and the contacted foreign continuity of the cell imphoma, leukaemia, B-cell lymphoma, low-grade or follicular non-cell lymphoma (MCL), immunocytoma (MCL), small B-cell lymphocytic lymphoma, leukaemia, HIV (human immunodeficiency virus) associated WHL, mantle-cell lymphoma (MCL), immunocytoma (MCL), small B-cell lymphocytic lymphoma, leukaemia, and inflammatory arthropathy. The MCGO-cell and treat a patient having a condition associated with the level of uncleic acid may be contacted with a cell to reduce MCGO gene in the contacted with a cell to reduce MCGO activity of the cell and treat a patient having a condition associated with the level of the action acid may be used to cleave RNA of the MCGO activity of the cell and treat a patient having a condition associated with the level of the cell and treat a patient having a condition associated with the level of cell and treat a patient having a condition acid may be used to treat central nervous system (CNA) injury and cerebrovascular accident (CNA, stroke), Alzheimer's disease, condition of NGGO expression. The present cell states which respond to the modulation of NGGO expression. The presen
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local :
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(BLAT/)
(MCSW/)
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   Human; ss; antisense therapy; cytostatic; antiinflammatory; haemostatic; cerebroprotective; nootropic; neuroprotective; antiparkinsonian;
                                                                                                Human NOGO
                                                                                                                                                       12-MAR-2002
                                                                                                                                                                                                                                                                                  ABK00237 standard; RNA; 17
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                                                                                                Hammerhead Ribozyme
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Pred. No. 1.9e+03;
5; Mismatches 2;
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Sequence 17

BP; 14 A;

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the invention 0 Other;

is a hammerhead ribozyme of

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CC expression of a CD20 gene and a nucleic acid molecule which down regulates compression of a CD20 gene and a nucleic acid molecule which down completes expression of a country of a neurite growth inhibitor gene (NOGO). The CC mucleic acids may be enzymatic nucleic acids (e.g. a ribozyme or a CC DNAzyme) an Inozyme (an endolytic nucleic acid cleaving an RNA molecule country) and country of country of the co
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        DNAzyme; inozyme; G-cleaver; amberzyme; zinzyme; lymphoma; leukaemia; B-cell lymphoma; non-Hodgkin's lymphoma; NHL; lymphocytic leukaemia; human immunodeficiency virus; HIV associated NHL; mantle-cell lymphoma; MCL; immunocytoma; IMC; immune thrombocytopaenia; stroke; dementia; inflammatory arthropathy; central nervous system injury; cerebrovascular accident; CVA; Alzheimer's disease; multiple sclerosis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Nucleic acid molecules, e.g., enzymatic nucleic acids and antisense constructs, which down regulate expression of a CD20 gene or neurite growth inhibitor gene useful for treating, e.g., lymphoma, leukemia,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        11-FEB-2000; 2000US-0181797P.
28-FEB-2000; 2000US-0185516P.
06-MAR-2000; 2000US-0187128P.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           central nervous system injury.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (MCSW/)
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CHOWRIRA B M
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Length 17;

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RESULT 2406
ABA82505
ID ABA8250
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ABL46735
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Best Local S
Matches 15
                                                                                                                                   Query Match
Best Local S
Matches 14
                                                                                                                                                                                                  The present invention relates to oligonucleotides that downregulate the expression of human Grb2-related with Insert Domain (GRID) gene. GRID is a T-cell co-stimulatory adaptor protein. The oligonucleotides are useful for modulating the expression of GRID, to treat conditions such as tissue/graft rejection and leukaemia. The oligonucleotides can also be administered in conjunction with other therapies such as radiation, chemocherapy and cyclosporin treatment. The present oligonucleotide was used to illustrate the invention
                                                                                                                                                                                                                                                                                                                            New nucleic acid(s) for regulating the Grb2-related (GRID) gene comprises using antisense and enzymatic molecules such as hammerhead ribozymes.
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            ABA82505
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                                 ABA82505 standard;
                                                                                                                                                                               Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human;
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                                                                                                                                                                                BP; 4 A; 10 C; 2 G; 0 T; 1 U; 0 Other;
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                                   DNA; 17
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Pred. No. 1.9e+03;
                                                                                                                                              Score 13.8; DB 1;
Pred. No. 1.9e+03;
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tissue rejection; graft rejection;
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Matches 15
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Pager's disease, sclerostogis, osteomalacia and fibrous dysplasia.

ABA82038 to ABA82700 and AAG68168 to AAG69193 represent sequences used
                                                                                                                                                                                                                                                                                                                                                                           Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; Page 36; 443pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Carulli JP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             05-APR-2000; 2000US-00543771.
05-APR-2000; 2000US-00544398.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Synthetic.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Human; high bone mass; HBM gene; Zmax1 gene; chromosome 11; 11q13.3; sequence tagged site; STS; osteoporosis; osteopathic; gene therapy; antisense therapy vaccine; bone disorder; Paget's disease; adapter; sclerostosis; osteomalacia; fibrous dysplasia; PCR primer; linker; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  21-JUN-2000; 2000WO-US016951
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              25-JAN-2002
                                                                                                                                             Zmax1
                                                                                                                                                                     25-JAN-2002 · (first entry)
                                                                                                                                                                                            ABA82230;
                                                                                                                                                                                                                    ABA82230 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    modulating
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                New high
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (GENO-) GENOME THERAPEUTICS CORP.
                                                                                                                                                                                                                                                                                                                             Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                    exemplification of the
                                                                                                                                                                                                                                                                                                     996
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      gene region physical map preparation
                                                                                                                                             gene
                                                                                                                                                                                                                                                                               ш
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    bone mass (HBM) and ng bone mass for the
                                                                                                                                                                                                                                                                                                     GGGCTCAAGCGATTCTC 1012
                                                                                                                                                                                                                                                                                GCGCTCAAGCAATTCTC
                                                                                                                                             region
                                                                                                                                                                                                                                                                                                                               Conservative
                                                                                                                                                                                                                                                                                                                                                                            BP; 4 A; 6 C; 3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Little
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (first entry)
                                                                                                                                             physical map preparation STS marker #189
                                                                                                                                                                                                                     DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                RD,
                                                                                                                                                                                                                                                                                                                                         1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Recker RR,
                                                                                                                                                                                                                     BP.
                                                                                                                                                                                                                                                                                17
                                                                                                                                                                                                                                                                                                                                                                                                     present invention
                                                                                                                                                                                                                                                                                                                                                                             G; 4 T; 0 U;
                                                                                                                                                                                                                                                                                                                             <u>.</u>
                                                                                                                                                                                                                                                                                                                             Score 13.8; D
Pred. No. 1.9e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Zmax1 gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              genes and proteins useful
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Johnson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      of e.
                                                                                                                                                                                                                                                                                                                                          1.9e+03;
                                                                                                                                                                                                                                                                                                                                                                              0 Other;
                                                                                                                                                                                                                                                                                                                                                      DB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         STS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     .g. osteoporosis.
                                                                                                                                                                                                                                                                                                                                                      <u>-</u>
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                                                                                                                                                                                                                                                                                                                                                     Length
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         #464
                                                                                                                                                                                                                                                                                                                                                        17;
                                                                                                                                                                                                                                                                                                                               <u>.</u>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   for
                                                                                                                                                                                                                                                                                                                                Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                                                     therapy,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          and HBM
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Human; high bone mass; HBM gene; Zmax1 gene; chromosome 11; 11q13 3; sequence tagged site; STS; osteopotrosis; osteopathic; gene therapy; antisense therapy; vaccine; bone disorder; paget's disease; adapter; sclerostosis; osteomalacia; fibrous dysplasia; PCR primer; linker; ss

Synthetic.

sapiens.

18-OCT-2001. WO200177327-A1

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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Query Match
Best Local
                                   30-JAN-2001;
30-JAN-2001;
30-JAN-2001;
30-JAN-2001;
30-JAN-2001;
30-JAN-2001;
                                                                                                         26-MAY-2000;
21-SEP-2000;
27-SEP-2000;
04-OCT-2000;
30-JAN-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    The present invention describes the human Zmax1 gene and the high bone mass (HBM) gene, which are found on chromosome 11q13.3. The Zmax1 and HBM genes have osteopathic activities. The genes can be used in gene therapy, antisense therapy and in the production of vaccines. They can be used in the diagnosis and treatment of bone disorders including osteoporosis, in the diagnosis and treatment of bone disorders including osteoporosis,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              the diagnosis and treatment of bone disorders including osteoporosis, Paget's disease, sclerostosis, osteomalacia and fibrous dysplasia. ABA82038 to ABA82700 and AAG68168 to AAG68193 represent sequences used in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        05-APR-2000;
05-APR-2000;
                                                                                                                                                                                                                                                                                   Human; genome-derived myosin-like protein 1; GDMLP-1; hGDMLP-1; heart; muscle; myosin; chromosome 22; gene therapy; vaccine; heart disease; skeletal muscle disorder; amplicon; screening; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Disclosure;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           modulating bone mass for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        New high bone mass (HBM)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               WPI; 2001-657171/75
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                                                                                                                                                                                                                                                                                                                                     Human GDMLP-1 17-mer scanning SEQ ID NO:5 sequence SEQ ID NO:8863
                                                                                                                                                                                                                                                                                                                                                                                                               ABN08871 standard; DNA; 17
            30-JAN-2001;
30-JAN-2001;
                                                                                                                                                                                                             06-DEC-2001
                                                                                                                                                                                    25-MAY-2001;
                                                                                                                                                                                                                                    WO200192524-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    exemplification of the present invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   994
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           l Similarity 88.2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        JP,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 GENOME THERAPEUTICS CORP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CCGGGCTCAAGCGATTC 1010
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            CTGGGTTCAAGCGATTC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Page 34; 443pp; English
2000US-0236359P.
2001WO-US000661.
2001WO-US000662.
2001WO-US000663.
2001WO-US0006664.
2001WO-US000666.
2001WO-US000666.
2001WO-US000666.
2001WO-US000667.
2001WO-US000667.
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2000US-00544398.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              2000WO-US016951
                                                                                                                                              2000US-0207456P.
2000US-0234687P.
                                                                                                                                                                                     2001WO-US016981.
                                                                                                                                                                                                                                                                                                                                                               (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             5 C; 4 G; 3 T; 0 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           and
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Recker RR,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Zmax1 genes and proteins useful treatment of e.g. osteoporosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 13.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mismatches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Length 17;
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Sequence 17

BP; 5 A; 4 C; 5

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w 7;

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0 Other;

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The present sequence represents an oligomer used in the screening of the hgDMLP-1 sequence in the exemplification of the present invention. N.B. The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO at ftp.wipo.int/pub/published pct sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                     nucleic acids can be used as probes to detect, characterise and quantify hGDMLP-1 nucleic acids in samples, as amplification substrates, to provide initial substrates for the recombinant engineering of hGDMLP-1 protein variants having desired phenotypic improvements, and for expressing the proteins. The hGDMLP-1 proteins or polypeptides may be used as immunogens to raise antibodies that specifically recognise hGDMLP proteins, as standards in assays used to determine the concentration and/or amount specifically of hGDMLP proteins, as specific biomolecule capture probes for surface-enhanced laser description ionisation, as the concentration and the proteins of the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           New polypeptide, for raising antibodies that recognize hGDMLP-1 proteins, or as specific biomolecule capture probes for surface-enhanced laser desorption ionization, comprises human myosin-like protein hGDMLP-1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Gu Y,
                                                                                                                                                                                                                                                        therapeutic supplement in patients having specific deficiency in hGDMLP-production, and in vaccines or for replacement therapy. The polynucleotide sequences encoding hGDMLP-1 may be used for diagnosing a disorder associated with the expression of hGDMLP-1, in particular heart and skeletal muscle disorders. hGDMLP-1 is localised to chromosome 22.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 05-FEB-2001; 2001US-0266860P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1 can
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               The present
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (AEOM-) AEOMICA INC
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          be used
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           1 (hGDMLP-1).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      invention describes a human genome-derived myosin-like nGDMLP-1). The protein and polynucleotide sequences of hGDMLP-
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Penn SG,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          in gene therapy and vaccine production. The hGDMLP-1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Hanzel DK,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            DR,
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                                                                                                                                                                                                                                                                                                                                                                                                                                         in hGDMLP-1
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                                                                                                                                                                                                                                          ABN09432
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                                                                                                                                                                                                                                                                                                                                               Query Match
26-MAY-2000;
21-SEP-2000;
27-SEP-2000;
                                                                                                                      Human; genome-derived myosin-like protein 1; GDMLP-1; hGDMLP-1; heart; muscle; myosin; chromosome 22; gene therapy; vaccine; heart disease; skeletal muscle disorder; amplicon; screening; ss.
                                                                                                                                                                  Human GDMLP-1 17-mer scanning
                                         25-MAY-2001;
                                                              06-DEC-2001.
                                                                                  WO200192524-A2
                                                                                                     Homo sapiens.
                                                                                                                                                                                       29-MAY-2002
                                                                                                                                                                                                           ABN09432;
                                                                                                                                                                                                                              ABN09432 standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                     Local
                                                                                                                                                                                                                                                                                                       197 CCATGTTGGTCAGGCTG 213
                                                                                                                                                                                                                                                                                   17
                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                   CCATCTTGATCAGGCTG
                                                                                                                                                                                                                                                                                                                             Conservative
 2000US-0234687P.
2000US-0234687P.
2000US-0236359P.
                                           2001WO-US016981.
                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                    88.2%;
                                                                                                                                                                                                                                ВP
                                                                                                                                                                                                                                                                                                                             0
                                                                                                                                                                                                                                                                                                                                                Score 13.8;
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0; Mismatches
                                                                                                                                                                   SEQ ID NO:5 sequence SEQ ID NO:9424.
                                                                                                                                                                                                                                                                                                                                       No. 1.9e+03
                                                                                                                                                                                                                                                                                                                                                 DB 1;
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RESULT 2410
ABN09435/c
ID ABN0943
XX
AC ABN0943
AC ABN0943
XX
DT 29-MAY-
XX
DE Human (
XX
DE Human;
KW muscle;
KW skelete;
XX
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                                                                                                                                                                                                                                                                                                                                                                                                                                                          individual control of the provide initial substrates for the recombinant engineering of hGDMLP-1 nucleic acids in samples, as amplification substrates, to provide initial substrates for the recombinant engineering of hGDMLP-1 protein variants having desired phenotypic improvements, and for expressing the proteins. The hGDMLP-1 proteins or polypeptides may be used as immunogens to raise antibodies that specifically recognise hGDMLP -1 proteins, as standards in assays used to determine the concentration and/or amount specifically of hGDMLP proteins, as specific biomolecule capture probes for surface-enhanced laser desorption ionisation, as therapeutic supplement in patients having specific deficiency in hGDMLP-1 production, and in vaccines or for replacement therapy. The polynucleotide sequences encoding hGDMLP-1 may be used for diagnosing a disorder associated with the expression of hGDMLP-1, in particular heart and skeletal muscle disorders. hGDMLP-1 is localised to chromosome 22.

The present sequence in the exemplification of the present invention. N.B.

The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO
                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local S
Matches 15
                 Human; genome-derived myosin-like protein 1; GDMLP-1; hGDMLP-1; heart; muscle; myosin; chromosome 22; gene therapy; vaccine; heart disease; skeletal muscle disorder; amplicon; screening; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             New polypeptide, for raising antibodies that recognize hGDMLP-1 proteins, or as specific biomolecule capture probes for surface-enhanced laser desorption ionization, comprises human myosin-like protein hGDMLP-1.
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                                                                                                                                                          ABN09435
                                                                                                                                                                                          ABN09435 standard; DNA; 17 BP
                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 17
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30-JAN-2001;
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30-JAN-2001;
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30-JAN-2001;
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30-JAN-2001;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        he present invention describes a human genome-derived myosin-like rotein 1 (hGDMLP-1). The protein and polynucleotide sequences of hGDMLP-can be used in gene therapy and vaccine production. The hGDMLP-1 ucleic acids can be used as probes to detect, characterise and quantify
                                                                                                                                                                                                                                                                                                                                                                                                                                            ftp.wipo.int/pub/published_pct_sequence
                                                                                                                                                                                                                                                                                                             346
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                                                                                      GDMLP-1
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2001WO-US000661.
2001WO-US000663.
2001WO-US000663.
2001WO-US000664.
2001WO-US000667.
2001WO-US000667.
2001WO-US000668.
2001WO-US000669.
2001WO-US000669.
2001WO-US000669.
                                                                                                                                                                                                                                                                                                                                                Conservative
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                                                                                                                        (first entry)
                                                                                     17-mer
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                                                                                                                                                                                                                                                                                                                                                                                                                ð
                                                                                                                                                                                                                                                                                                                                                                                                                5 C;
                                                                                                                                                                                                                                                                                                                                                              88.2%;
                                                                                   scanning
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Pred. No. 1.9e+03
                                                                                     SEQ
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RESULT 2411 ABN06554/c ID ABN06554 standard; DNA; 17

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17

343 CAAGCTGGTCTCCTGAG 359

CAGGCTTGTCTCCTGAG 1

Query Match Best Local S Matches 15

l Similarity 88.; 15; Conservative

1.4%;

Score 13.8; D Pred. No. 1.9e 0; Mismatches

1.9e+03; DB 1;

Indels

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nucleic acids can be used as probes to detect, characterize and quantify CC highMLP-1 nucleic acids in samples, as amplification substrates, to CC provide initial substrates for the recombinant engineering of hGDMLP-1 protein variants having desired phenotypic improvements, and for CC expressing the proteins. The hGDMLP-1 proteins or polypeptides may be used as immunogens to raise antibodies that specifically recognise hGDMLP-1 proteins, as standards in assays used to determine the concentration and/or amount specifically of hGDMLP proteins, as specific biomolecule capture probes for surface-enhanced laser description ionisation, as the therapeutic supplement in patients having specific deficiency in hGDMLP-1 production, and in vaccines or for replacement therapy. The production, and in vaccines or for replacement therapy. The CC polynucleotide sequences encoding hGDMLP-1 may be used for diagnosing a CC disorder associated with the expression of hGDMLP-1, in particular heart and skeletal muscle disorders. hGDMLP-1 is localised to chromosome 22. The present sequence in the exemplification of the present invention. N.B. CC The sequence in the exemplification of the present invention. N.B. CC HGDMLP-1 sequence in the exemplification of the printed CC specification, but was obtained in electronic format directly from WIPO at fig. wipo.int/pub/published_pct_sequence
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30-JAN-2001;
30-JAN-2001;
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30-JAN-2001;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            New polypeptide, for raising antibodies that recognize hGDMLP-1 proteins, or as specific biomolecule capture probes for surface-enhanced laser desorption ionization, comprises human myosin-like protein hGDMLP-1.
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27-SEP-2000;
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Sequence
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                                                                                                                                                                                                                                                                                                                                                                                                                                                            Disclosure; SEQ ID NO 9427;
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2001WO-US000669.
2001WO-US000669.
2001WS-US000669.
 BP; 5 A; 5 C; 5
                                                                                                                                                                                                                                                                                                                                                                                                                      invention describes a human genome-derived myosin-like
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2000US-0236359P.
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 G; 2 T; 0 U; 0 Other;
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CC protein 1 (hgDMLP-1). The protein and polynucleotide sequences of hgDMLP-1 cc 1 can be used in gene therapy and vaccine production. The hgDMLP-1 cc nucleic acids in sembles to detect, characterise and quantify cc hgDMLP-1 nucleic acids in samples, as amplification substrates, to cc provide initial substrates for the recombinant engineering of hgDMLP-1 cc protein variants having desired phenotypic improvements, and for cc expressing the proteins. The hgDMLP-1 proteins or polypeptides may be cused as immunogens to raise antibodies that specifically recognise hgDMLP-1 capture probes for surface-enhanced laser description ionisation, as computed for the reapeutic supplement in patients having specific deficiency in hgDMLP-1 conduction, and in vaccines or for replacement therapy. The cc polynucleotide sequences encoding hgDMLP-1 may be used for diagnosing a cd disorder associated with the expression of hgDMLP-1, in particular heart cand skeletal muscle disorders. hgDMLP-1 is localised to chromosome 22. The present sequence represents an oligomer used in the screening of the hgDMLP-1 sequence in the exemplification of the present invention. N.B. The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO capture for int/nuh/hibishad not accommence.
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30-JAN-2001
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21-SEP-2000;
27-SEP-2000;
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skeletal muscle disorder; amplicon; screening; ss.
                                                                                                                                                                                                                                                                                                                                                                                                                                           New polypeptide, for raising antibodies that recognize hGDMLP-1 proteins or as specific biomolecule capture probes for surface-enhanced laser desorption ionization, comprises human myosin-like protein hGDMLP-1.
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                                                                                                                                                                                                                                                                                                                                                                                                                 Disclosure;
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2001WO-US000666.
2001WO-US000667.
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Query Match

17

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3 C; 9 1.4%;

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Score 13.8;

Length

17;

specification, but was obtained in electro
at ftp.wipo.int/pub/published_pct_sequence

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RESULT 2412
ABN06555/c
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The present invention describes a human genome-derived myosin-like CC protein 1 (hGDMLP-1). The protein and polynucleotide sequences of hGDMLP-CC 1 can be used in gene therapy and vaccine production. The hGDMLP-1 cC nucleic acids can be used as probes to detect, characterise and quantify cC hGDMLP-1 nucleic acids in samples, as amplification substrates, to provide initial substrates for the recombinant engineering of hGDMLP-1 cC protein variants having desired phenotypic improvements, and for cexpressing the proteins. The hGDMLP-1 proteins or polypeptides may be used as immunogens to raise antibodies that specifically recognise hGDMLP cused as immunogens to raise antibodies that specifically recognise hGDMLP capture proteins, as standards in assays used to determine the concentration cand/or amount specifically of hGDMLP proteins, as specific biomolecule capture probes for surface-enhanced laser desorption ionisation, as concentration, and in vaccines or for replacement therapy. The production, and in vaccines or for replacement therapy. The
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30-JAN-2001;
30-JAN-2001;
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21-SEP-2000;
27-SEP-2000;
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skeletal muscle
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30-JAN-2001;
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2000US-0234687P.
2000US-0236359P.
2001WO-US000661.
2001WO-US000663.
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30-JAN-2001; 2001WO-US000665.
30-JAN-2001; 2001WO-US000668.
30-JAN-2001; 2001WO-US000668.
30-JAN-2001; 2001WO-US000669.
23-MAY-2001; 2001US-00364761.
09-OCT-2001; 2001US-0327898P.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              disorder associated with the expression of hGDMLP-1, in particular heart and skeletal muscle disorders. hGDMLP-1 is localised to chromosome 22. The present sequence represents an oligomer used in the screening of the hGDMLP-1 sequence in the exemplification of the present invention. N.B. The sequence data for this patent did not form part of the printed specification, but was obtained in electronic format directly from WIPO specification, but was obtained in electronic format directly from WIPO
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Human; gene therapy; tumour suppressor; HTPL; chromosome 10p12.1; human testis expressed Patched like protein; testis; adrenal; liver; male germ cell development; bone marrow; brain; kidney; lung; placenta; prostate; skeletal muscle; colon; male infertility; cancer; ss.
                                                                                                                                                                             Novel isolated human testis expressed Patched like protein (HTPL), useful for identifying agonist and antagonist and specific binding partners, and for treating subjects having defects in HTPL.
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                                                                                                                                                   Example 2; Page 127; 718pp; English.
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No. 1
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The present invention relates to human testis expressed Patched like protein (HTPL, see ABV78759 to ABV78762 and ABB98519 to ABB98520). HTPL has two isoforms, with a few single base pair differences between the two. One of the single base pair changes introduces a premature stop codon in HTPL-S (S for short) compared to HTPL-L (L for long). HTPL shares an overall structure organisation with the Patched protein. The shared structural features strongly imply that HTPL plays a role similar to that of Patched, and is a potential tumour suppressor. HTPL is important in regulating male germ cell development, and the HTPL gene was mapped to human chromosome 10p12.1. HTPL and its coding sequence are

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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  useful for diagnosing a disorder caused by mutation in HTPL, and in therapy and manufacture of a medicament for treatment or prevention of such disorder associated with decreased expression or activity of human HTPL. Such disorders include disorders of testis, or adrenal, adult and foetal liver, bone marrow, brain, kidney, lung, placenta, prostate, skeletal muscle or colon function. HTPL proteins and nucleic acids are clinically useful diagnostic markers and potenial therapeutic agents for male infertility and cancer. The present oligonucleotide was used in an example from the invention
The invention relates to a method for identifying a molecule involved in lipid regulation comprising identifying a molecule that binds to or inhibits binding of a molecule to high bone mass (HBM) or its wild type gene, Zmax1. Compounds identified by the method are useful for treating, diagnosing, preventing or screening for normal and abnormal lipid-associated conditions, including arteriosclerosis, cardiovascular disease, stroke, and osteoporosis. The compounds may also be used in the treatment or prevention of diabetic atherosclerosis, neurovascular conditions caused by plaque build-up, poor circulation due to plaque build-up and associated poor wound healing. The methods may be used in gene therapy, pharmaceutical development, and diagnostic assays for bone
                                                                                                                                                                                                                                                        Identifying molecules involved in lipid regulation, useful diagnosing, treating or preventing e.g., arteriosclerosis, identifying a molecule that binds to high bone mass gene or corresponding wild type gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             osteoporosis; atherosclerosis; diabetic atherosclerosis; plaque build-up; neurovascular condition; wound healing; gene therapy; PCR primer; probe; bone development disorder; antiarteriosclerotic; cardiovascular;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Human Zmax1 cDNA reverse PCR primer #232.
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                                                                                                                                                                                                                         Disclosure;
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                                                                                                                                                                                                                                                                                                                                                                                                                           (UYCR-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ipid-associated condition;
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                                                                                                                                                                                                                       Page 41; 409pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                        Little RD,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Zmax1; HBM; high bone mass gene; lipid regulation; stroke;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                DNA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                           SCHOOL MEDICINE.
                                                                                                                                                                                                                                                                                                                                                                                        Recker RR,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 arteriosclerosis; cardiovascular disease;
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Pred. No. 1
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                                                                                                                                                                                                                                                                               gene or its
                                                                                                                                                                                                                                                                                                  comprises
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Molecules identified by comparison of Zmax1

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RESULT 2415
ABK23027/c
The invention relates to a method for identifying a molecule involved in C1 lipid regulation comprising identifying a molecule that binds to or c1 inhibits binding of a molecule to high bone mass (HBM) or its wild type C2 gene, Zmaxl. Compounds identified by the method are useful for treating, C3 diagnosing, preventing or screening for normal and abnormal lipid-C4 associated conditions, including arteriosclerosis, cardiovascular C5 disease, stroke, and osteoporosis. The compounds may also be used in the C5 treatment or prevention of diabetic atherosclerosis, neurovascular C6 treatment or prevention of diabetic atherosclerosis, neurovascular C7 conditions caused by plaque build-up, poor circulation due to plaque C6 build-up and associated poor wound healing. The methods may be used in C7 gene therapy, pharmaceutical development, and diagnostic assays for bone C7 development disorders. Molecules identified by comparison of Zmaxl and C7 development, in diagnosis of human or animal bone disease, and in the
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Query Match
Best Local (
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Human; mouse; Zmax1; HBM; high bone mass gene; lipid regulation; stroke; lipid-associated condition; arteriosclerosis; cardiovascular disease; 88; osteoporosis; atherosclerosis; diabetic atherosclerosis; plaque build-up; neurovascular condition; wound healing; gene therapy; PCR primer; probe; bone development disorder; antiarteriosclerotic; cardiovascular;
                                                                                                                                                                                                                                                                                                   Identifying molecules involved in lipid regulation, useful diagnosing, treating or preventing e.g., arteriosclerosis, identifying a molecule that binds to high bone mass gene or corresponding wild type gene.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Human Zmax1
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Matches Query Match

Similarity

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Score 13.8; I Pred. No. 1.9e 0; Mismatches

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DB 1; 2;

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RESULT 2416
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ID ABS75325
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                                                                                                                This invention describes a novel isolated nucleic acid that encodes one of three new isoforms of human pregnancy associated plasma protein E, PAPP-E. The products of the invention have abortive and contraceptive activity and can be used for gene therapy or in a vaccine. The nucleic acid, polypeptide encoded by it, or antibody to the polypeptide can be used in pharmaceutical compositions or vaccines for preventing or aborting pregnancy. PAPP-E is used in the antenatal diagnosis of dysgenetic pregnancies. The nucleic acids are used as probes to assess the level of PAPP-E isoform mRNA in chorionic villus samples, and the antibodies can be used to assess the expression levels of PAPP-E isoform actions of the contraction of the co
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contraceptive; gene therapy; vaccine; pregnancy; antenatal; diagnosis;
dysgenetic pregnancy; primer; ss.
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                                          proteins in chorionic villus samples, to diagnose dysgenetic pregnancies antenatally. This sequence represents an oligomer used in scanning the human PAPP-E genes described in the disclosure of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                               New isolated nucleic acid encoding an isoform of human pregnancy associated plasma protein E, for preventing or aborting pregnanc
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            WPI; 2002-697817/75
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                 353pp; English.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Length
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ABK56068/c
                                                            Query Match
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Matches 15
                                                                                                                                                                                                The invention relates to enzymatic nucleic acid molecules that down regulate expression of chloride channel calcium activated 1 (CLCA1) genes by cleaving RNA derived from the genes. The nucleic acid sequences are useful as pharmaceutical agents for treating conditions such as chronic obstructive pulmonary disease (COPD), chronic bronchitis, asthma, cystic fibrosis, obstructive bowel syndrome and any other diseases or conditions that are related to or will respond to the levels of CLCA1 in a cell or rissue. The sequences are useful for reducing CLCA1 activity in a cell, hence, are useful for treatment of a patient having a condition associated with the level of CLCA1, where the invention further comprises the use of one or more therapies under conditions suitable for the treatment, for example, oxygen thereby bronchodilators, corticosteroids, antibacterials, vaccinations, acetylcysteine and mucokinetic agents. The nucleic acids of the invention are also used as diagnostic tools to
                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Enzymatic polynucleotide that down regulates expression of chloride channel calcium activated gene, useful for treating Chronic obstruct pulmonary disease (COPD), chronic bronchitis and asthma.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (RIBO-)
(SYNT )
(THOM/)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Human; chloride channel calcium activated 1; CLCA1; ss; antiasthmatic; antiinflammatory; chronic obstructive pulmonary disease; COPD; asthma; chronic bronchitis; cystic fibrosis; obstructive bowel syndrome;
                                                                                                                                                      examine genetic drift and mutations within diseased the presence of CLCA1 RNA in a cell. This sequence renzymatic nucleic acid molecule of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Homo sapiens.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Human CLCA1 gene enzymatic nucleic acid #439
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             ABK56068 standard; RNA; 17
                                                                                                                       Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                          Claim 4; Page 60; 152pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WPI; 2002-217145/27.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Thompson J, Grupe A;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   oxygen therapy;
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                                                            l Similarity
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SYNTEX USA LLC.
THOMPSON J.
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 CTGAGATCAAGAATACT 1
                             CTGAGATCAAGCATCCT 536
                                                                                                                        BP;
                                                            Conservative
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                                                            Score 13.8; DB 1;
Pred. No. 1.9e+03;
0; Mismatches 2
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T;
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                                                                                                                          0 Other;
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                                                                                      Length 17;
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                                                                                                                                                                        represents
                                                                                                                                                                                     cells or to detect
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Chronic obstructive
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                                                            Gaps
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ACN14418/
ID ACN1
XX
AC ACN1
XX
DT 22-A

ACN14418 standard;

RNA; 17

0

22-APR-2004 ACN14418;

(first entry)

RESULT 2419

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RESULT 2418
ACN01141
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                                                        Query Match
Best Local Sim
Matches . 11;
                                                                                                                                                The invention relates to nucleic acid molecules that modulate replication of the West Nile Virus (MAV). The nucleic acid molecules are useful for treating a condition related to MNV infection e.g. pancreatitis, encephalitis, myocarditis, meningitis, neurologic infection, hepatitis, liver failure, hepatocellular carcinoma or cirrhosis. The nucleic acid molecule is selected from the group of ribozymes consisting of Hammerhead, Inozyme, G-cleaver, DNAzyme, Amberzyme and Zinzyme. The nucleic acid molecules further comprise at least five ribose residues, at least three of the 5' terminal nucleotides and a 3' end modification of a 3'-3' inverted abasic molety. Nucleic acid molecules SEQ ID NO 1 to 37080 are claimed; however, SEQ ID NO 2194-2206 and 17502-17514 are not given in the specification. The present sequence is that of a nucleic acid molecule of the invention
                                                                                                                                                                                                                                                                                                                                                                                      Claim 23; SEQ ID NO 1131; 495pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                   New nucleic acid molecule that modulates replication of West Nile Virus (WNV), useful for treating a condition related to WNV infection e.g. pancreatitis, meningitis, hepatocellular carcinoma or cirrhosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Blatt
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         virucide; neuroprotective; antibacterial; replication; pancreatitis; encephalitis; myocarditis; meningitis; infection; hepatitis; liver failure; cancer; cirrhosis; Hammerhead; Inozyme; DNAzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WNV Hammerhead Ribozyme substrate
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                                                                                                                     Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WPI; 2002-706994/76.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WNV; West Nile Virus; antiinflammatory; cytostatic;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       19-OCT-2001; 2001WO-US048350.
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                                                                        Local Similarity
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BLATT L.
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                           GTCAGGCTGGTCTCAAA 1125
GUCAGGCUCCUCAAA 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Zinzyme; ss
                                                         1.4%;
nilarity 64.7%;
Conservative
                                                                                                                      BP; 4 A; 6 C; 3
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                                                           4;
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                                                                           Score 13.8;
Pred. No. 1.
                                                             Mismatches
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 Query Match
Best Local
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                                                                                                                                                                                                                                                                                                                                                                                                  of the West Nile Virus (WNV). The nucleic acid molecules are useful for treating a condition related to WNV infection e.g. pancreatitis, encephalitis, myocarditis, meningitis, nurvologic infection, hepatitis, liver failure, hepatocellular carcinoma or cirrhosis. The nucleic acid molecule is selected from the group of ribozymes consisting of Hammerhead, Inozyme, G-cleaver, DNAzyme, Amberzyme and Zinzyme. The nucleic acid molecules further comprise at least tripe of the 5' terminal nucleotides and a 3' end modification of a 3'-3' inverted abasic moiety. Nucleic acid molecules SEQ ID NO 1 to 37080 are claimed; however, SEQ ID NO 2194-2206 and 175214 are not given in the specification. The present sequence is that of a nucleic acid molecule of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      WNV; West Nile Virus; antiinflammatory; cytostatic; hepatotropic; virucide; neuroprotective; antibacterial; replication; pancreatitis; encephalitis; myocarditis; meningitis; infection; hepatitis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         New nucleic acid molecule that modulates replication of West Nile (WNV), useful for treating a condition related to WNV infection e. pancreatitis, meningitis, hepatocellular carcinoma or cirrhosis.
WNV; West Nile Virus; antiinflammatory; cytostatic; hepatotropic; virucide; neuroprotective; antibacterial; replication; pancreatit encephalitis; myocarditis; meningitis; infection; hepatitis; liver failure; cancer; cirrhosis; Hammerhead; Inozyme; DNAzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Claim 23; SEQ ID NO 14421; 495pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     20-OCT-2000; 2000US-0242411P
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        WNV minus strand Amberzyme substrate SEQ ID
                                                                                                                                                                                                                                                                                                                                                                          Sequence 17 BP; 4 A; 3 C; 6
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                                                                           WNV minus
                                                                                                                                                                    ACN08942
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BLATT L.
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                                                                                                                                                                                                                                                                                                                            Similarity
                                                                                                                                                                    standard;
                                                                                                                                                                                                                                                 GTCAGGCTCCTCTCAAA
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                                                                           strand Hammerhead Ribozyme substrate SEQ
                                                                                                                                                                                                                                                                                                               Conservative
                                                                                                        (first entry)
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                                                                                                                                                                    RNA;
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Pred. No. 1.
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                               pancreatitis;
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RESULT 2421
ACN04915/c
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Query Match
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                                                                                                                                                                                                                                                                                                                                                                                                                                   of the West Nile Virus (WNV). The nucleic acid molecules are useful for treating a condition related to WNV infection e.g. pancreatitis, encephalitis, myocarditis, meningitis, neurologic infection, hepatitis, liver failure, hepatocellular carcinoma or cirrhosis. The nucleic acid molecule is selected from the group of ribozymes consisting of mucleic acid molecules further comprise at least ting of mucleic acid molecules further comprise at least five ribose residues, at least three of the 5' terminal nucleotides and a 3' end modification of a 3' inverted abasic moiety. Nucleic acid molecules SEQ ID NO 1 to 37080 are claimed; however, SEQ ID NO 2194-2206 and 17502-17514 are not given in the specification. The present sequence is that of a nucleic acid molecule of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      New nucleic acid molecule that modulates replication of West Nile (WNV), useful for treating a condition related to WNV infection e. pancreatitis, meningitis, hepatocellular carcinoma or cirrhosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Blatt
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Claim 23; SEQ ID NO 8945; 495pp; English.
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(BLAT/)
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           West Nile Virus
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                                                                        encephalitis; myocarditis; liver failure; cancer; ciri Amberzyme; Zinzyme; ss.
                                                                                                  WNV; West Nile Virus; antiinflammatory; cytostatic; hepatotropic; virucide; neuroprotective; antibacterial; replication; pancreatitis; encephalitis; myocarditis; meningitis; infection; hepatitis;
                                                                                                                                                      WNV DNAzyme substrate SEQ ID NO 4918.
                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 17
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                                                West Nile Virus
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BLATT L.
MCSWIGGEN J A.
                                                                                                                                                                                                                                                                                                                                                                       Similarity
                                                                                                                                                                                                                                                                                                                                 CGCCAGGTTGATCTTGA 822
                                                                                                                                                                                                                                                                                                       CGCCAAGUUGUUCUUGA 17
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                                                                                                                                                                                                                                                                                                                                                         Conservative
                                                                                                                                                                                                                                                                                                                                                                                                              BP; 3 A;
                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 relates to nucleic acid molecules that modulate replication
                                                                                       cancer; cirrhosis;
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                                                                                                                                                                                                                                                                                                                                                                                                               4 C;
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Pred. No. 1.
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06-SEP-2002

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RESULT 2422
ACN01975/c
ID ACN0197
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AC ACN0197
XX
AC ACN0197
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VINCTION
CONTROL OF ACTOR

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Best Local S
Matches 15
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      The invention relates to nucleic acid molecules that modulate replication of the West Nile Virus (WNV). The nucleic acid molecules are useful for treating a condition related to WNV infection e.g. pancreatitis, encephalitis, myocarditis, meningitis, neurologic infection, hepatitis, liver failure, hepatocellular carcinoma or cirrhosis. The nucleic acid molecule is selected from the group of ribozymes consisting of Hammerhead, Inozyme, G-cleaver, DNAzyme, Amberzyme and Zinzyme. The nucleic acid molecules further comprise at least five ribose residues, at least then 2'.O-methyl modifications, phosphorothicate linkages on at least three of the 5' terminal nucleic acid molecules SEQ ID NO 1 to 37080 are claimed; however, SEQ ID NO 2194-2206 and 17502-17514 are not given in the specification. The present sequence is that of a nucleic acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               New nucleic acid molecule that modulates replication of West Nile Virus (WNV), useful for treating a condition related to WNV infection e.g. pancreatitis, meningitis, hepatocellular carcinoma or cirrhosis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                          MNV; West Nile Virus; antiinflammatory; cytostatic; hepatotropic; virucide; neuroprotective; antibacterial; replication; pancreatitis; encephalitis; myocarditis; meningitis; infection; hepatitis;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Sequence 17
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           19-OCT-2001; 2001WO-US048350
         (RIBO-) RIBOZYME PHARM INC. (BLAT/) BLATT L.
                                                                                             20-OCT-2000; 2000US-0242411P
                                                                                                                                                        19-OCT-2001; 2001WO-US048350
                                                                                                                                                                                                                                                                                                                                          West Nile Virus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       WNV Inozyme substrate SEQ ID NO 1965.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  22-APR-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                 liver failure; cancer; cirrhosis; Hammerhead; Inozyme; DNAzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                805
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    17
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15; Conserv
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BLATT L.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TCGCCAAGTTGTTCTTG 1
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                                                                                                                                                                                                                                                                                                                                                                                                  Zinzyme;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              BP; 7
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           A; 4 C; 4 G; 0 T;
                                                                                                                                                                                                                                                                                                                                                                                                     88
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Score 13.8;
Pred. No. 1
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RESULT 2423
ABT34829/c
ID ABT3482
XX ABT3482
XX ABT3482
XX Tumour
XX Cytosta
KW antiser
KW schizog
KW human i
XX HOMO 86
XX HOMO 86
XX PN WO2003(
XX 27-WAR
XX 27-WAR
XX 27-WAR
XX 27-SEP
XX MOLB---
XX WPI; 2
XX WPI; 2
XX WPI; 2
XX WPI; 2
XX ABT34829/C
XX WPI; 2
XX WPI; 2
XX ABT34829/C
XX WPI; 2
XX WPI; 2
XX ABT34829/C
XX WPI; 2
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XX New is
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           of the West Nile Virus (WNN). The nucleic acid molecules are useful for treating a condition related to WNV infection e.g. pancreatitis, encephalitis, myocarditis, meningitis, neurologic infection, hepatitis, liver failure, hepatocellular carcinoma or cirrhosis. The nucleic acid molecule is selected from the group of ribozymes consisting of Hammerhead, Inozyme, G-cleaver, DNAzyme, Amberzyme and Zinzyme. The nucleic acid molecules further comprise at least five ribose residues, at least ten 2'-O-methyl modifications, phosphorothioate linkages on at least three of the 5' terminal nucleic tides and a 3' end modification of a 3'-3' inverted abasic moiety. Nucleic acid molecules SEQ ID NO 1 to 37080 are claimed; however, SEQ ID NO 2194-2206 and 17502-17514 are not given in the specification. The present sequence is that of a nucleic acid
                                                                                                                                                                                                                                                                                                                                                                               Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; geantiesne; sense; tumour; cell degeneration; cancer; Alzheimer's schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       New nucleic acid molecule that modulates replication of West Nile Virus (WNV), useful for treating a condition related to WNV infection e.g. pancreatitis, meningitis, hepatocellular carcinoma or cirrhosis.
                                                                                                                                                                                                                                                                                                                                             Homo sapiens
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Sequence 17 BP; 6 A; 4 C; 4 G; 0 T; 3 U; 0 Other;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 The invention relates to of the West Nile Virus (V
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Claim 23; SEQ ID NO 1965; 495pp; English.
                                                                                                                                                                                                                                                                         27-MAR-2003
                                                                                                                                                                                                                                                                                                            WO2003025175-A2
                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tumour suppression related human fukutin oligo SEQ
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                                                                                                                                                                                                  17-SEP-2001; 2001FR-00011978.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (MCSW/) MCSWIGGEN J A.
                                                                                                                                                                 (MOLE-) MOLECULAR ENGINES LAB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           15;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              standard; DNA; 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   of the invention
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       CGCCAAGTTGTTCTTGA 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Conservative
                                                                                                                                                                                                                                      2002WO-IB004208.
                                                                                                                            Amson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          1.4%;
                                                                                                                            Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      nucleic acid molecules that modulate replication
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ٥,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Score 13.8;
Pred. No. 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              .9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ID No
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                                                                                                                                                                                                                                                                                                                                                                                                                                     gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Gaps
                                                                                                                                                                                                                                                                                                                                                                                                                    gene chip;
disease;
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New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.

antibodies associated

Disclosure; Page 88; 720pp; French

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                                             Ś
                                        RESULT 2424
                                               Best Loc
Matches
                                                    Sequence 17
                                 12-JUN-2003
                                   ABT39507
                                                Local
                                             479
                                           17
                                                    BP;
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The invention relates to a novel isolated 17 mer nucleic acid sequence, CC given in the specification, a sequence containing at least 15 consecutive CC nucleotides from the 17 mer sequence, a sequence with, after optimal CC alignment, at least 80 % identity to the 17 mer sequence with, after optimal CC dignment, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one CC component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, coplypeptides, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for CC preparation of pharmaccuticals for prevention and/or treatment of viral CC diseases that are characterised by development of tumours or cell containing the acids. The polypeptides can also be used to generate antibodies, and containing the patient samples is useful for diagnosis and/or prognosis of these containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing the polypeptide and antibodies are useful as components of protein containing ABT39507 standard; DNA; 17 l Similarity 15; Conserv AGTGCAGTGGTGATC 495 AGTGGAGTGGTATGATC 1 Conservative u A; 1.4%; 7 C; 1 G; 4 T; 0 U; °, Score 13.8; DB 1; Pred. No. 1.9e+03; 0; Mismatches 2 0 Other; DB 1; 2 Length 17; Indels 0; Gaps

(first entry)

Tumour suppression related human fukutin oligo SEQ ID No 5144.

Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.

WO2003025175-A2

27-MAR-2003

17-SEP-2002; 2002WO-IB004208

17-SEP-2001; 2001FR-00011978

(MOLE-) MOLECULAR ENGINES LAB

Telerman A, Amson R, Tuijnder M;

WPI; 2003-313353/30.

New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.

Disclosure; Page 635; 720pp; French

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CC given in the specification, a sequence containing at least 15 consecutive concleotides from the 17 mer sequence with, after optimal confidence for them under highly stringent conditions, or the complement confidence that the corresponding RNA. The novel isolated mucleic cof any of them, or the corresponding RNA. The novel isolated mucleic component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for component of a gene chip, in vitro as (anti)sense reagents, and for components of pharmaccuticals for prevention and/or treatment of viral confidence that are characterised by development of tumours or cell confidence that are characterised by development of tumours or cell confidence and also halves and also halves are useful for diseases that are characterised by development of tumours or cell confidence and also he used to generate antibodies, and confidence and antibodies are useful as components of these chips. The nucleic acid sequences of the invention can be used in gene chips. The nucleic acid sequences of the invention can be used in gene cherapy. This polymeride and antibodies are useful as components of gene cherapy. This polymeride and antibodies are useful as components of protein chips.
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Sequence 17 BP; 2 A; 6 C; 5 G; 4 T; 0 U; 0 Other;

S 닭 Matches Query Match Best Local S 837 GATCTGCCTGCCTCGGC 853 15; Similarity GATCTGCCAGCCTTGGC 17 Conservative 1.4%; 0 Score 13.8; Db 1, Pred. No. 1.9 0; Mismatches DB 1; Length 17; Indels 0 Gaps 0

0

RESULT 2425 ABT35178/c 12-JUN-2003 ABT35178 standard; DNA; 17 ABT35178, (first entry)

Tumour suppression related human fukutin oligo SEQ ID No 815.

Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease; schizophrenia; protein chip; gene therapy; tumour suppression; human fukutin; ds.

WO2003025175-A2

27-MAR-2003.

17-SEP-2002; 2002WO-IB004208

17-SEP-2001; 2001FR-00011978.

(MOLE-) MOLECULAR ENGINES LAB

Telerman A, Amson R, Tuijnder M;

2003-313353/30.

New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.

Page 128; 720pp; French.

The invention relates to a novel isolated 17 mer nucleic acid given in the specification, a sequence containing at least 15 sequence, consecutive

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888888888888888888888888888888888888
cc nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that the hybridizes to them under highly stringent conditions, or the complement co f any of them, or the corresponding RNA. The novel isolated nucleic conditions of the invention are useful as probes and primers for detecting, conditioning quantifying and/or amplifying and primers for detecting, conditioning the nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, con polypeptides, vectors containing the nucleic acids, cells containing the polypeptides, vector or antibodies directed against the polypeptides are useful for corporation, specifically cancer but also Alzheimer's disease and condiseases that are characterised by development of tumours or cell content samples is useful for diagnosis and/or prognosis of these condiseases. The polypeptides can also be used to generate antibodies, and components of protein contents. The nucleic acid sequences of the invention can be used in gene therapy. This polynucleotide sequence represents a tumour suppression contents of protein contents.
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ABT38397/c
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Best Local S
Matches 15
                                                                                                             New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence 17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Tumour suppression related human fukutin oligo SEQ ID No
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ABT38397
                                                                                                                                                                                                                                                                                 17-SEP-2001; 2001FR-00011978.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         12-JUN-2003
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ABT38397 standard;
                                                                                                                                                                                                                                                (MOLE-) MOLECULAR ENGINES LAB.
                                                                                                                                                                               2003-313353/30.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                    fukutin;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         17
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         AGGGCAGTGGTATGATC 1
                                                                                                                                                                                                                                                                                                                                                                                                                                                 sense; tumour; cell degeneration; cance
ila; protein chip; gene therapy; tumour
in; ds.
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                                                                                                                                                                                                                Amson R,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         (first
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1.4%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        7 C; 2 G; 4 T; 0 U;
                                                                                                                                                                                                                Tuijnder M;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ВP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Score 13.8; DB 1;
Pred. No. 1.9e+03;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         DB 1; Length 17;
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The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that

mer sequence,

The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic

Disclosure; Page 715; 720pp; French.

with tumors and cell d and transfected cells.

New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies

Page

505;

720pp;

French.

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RESULT 2427
ABT40193/c
ID ABT4019
XX ABT4019
XX ABT4019
XX Tumour
XX Cytosta
XW Cytosta
XW Cytosta
XW antiser
XW Schizop
XW Human f
XX Homo sa
XX To lerma
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CC given i
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RESULT 2428
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                                                                                                                                                                                                                                                                                                         New isolated nucleic acid, useful with tumors and cell degeneration, and transfected cells.
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Pred. No. 1.9e
0; Mismatches
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cc component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, colypeptides, vectors containing the nucleic acids, cells containing the polypeptides are useful for cector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral containing the prevention and/or treatment of viral containing the polypeptides are useful for diseases that are characterised by development of tumours or cell contained to the polypeptide of the expression of the 17 mer nucleic acids in patient samples is useful for diagnosis and/or prognosis of these contained the polypeptide and antibodies are useful as components of protein chips. The nucleic acid sequences of the invention can be used in gene charapy. This polynucleotide sequence represents a tumour suppression con contained the contained to the invention can be used in gene contained the polynucleotide sequence represents a tumour suppression contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be used in gene contained to the invention can be useful to the invention can be use
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BP; 3 A;
7 C; 3
G; 4 T; 0 U; 0 Other;
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Matches
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              479
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17
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              AGTGCAGTGGTGATC 495
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                                    1.4%;
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RESULT 24
ABT36213
                                            Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disschizophrenia; protein chip; gene therapy; tumour suppression;
                                human
                                                                                                                                                 12-JUN-2003
                                                                                                                                                                                  ABT36213;
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Homo sapiens
                                schizophrenia;
human fukutin;
                                                                                                                                                                                                                                               2429
                                                                                                               suppression
                                                                                                                                                 (first entry)
                                  protein
ds.
                                                                                                                    related
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gene chip; disease;

WO2003025175-A2 27-MAR-2003

17-SEP-2002; 2002WO-IB004208

17-SEP-2001; 2001FR-00011978.

(MOLE-) MOLECULAR ENGINES LAB

Telerman A, Amson R, Tuijnder

WPI;

New isolated nucleic acid, useful for treating viral diseases associated with tumors and cell degeneration, also related polypeptides, antibodies and transfected cells.

Disclosure; Page 249; 720pp; French

given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive

The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one

Disclosure; Page 184; 720pp; French

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RESULT 2430
ABT37096
ID 37096
AC ABT3709
XX ADT3709
XX Tumour
XX Cytosta
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KW Schizop
KW Schizop
KW Homo sa
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Matches 15
                 The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence containing at least 15 consecutive nucleotides from the 17 mer sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti) sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, polypeptides, vectors containing the nucleic acids, cells containing the
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                                                                                                                                                                                                                                                                                                                                                      New isolated nucleic acid, useful for treating viral diseases with tumors and cell degeneration, also related polypeptides, and transfected cells.
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vector or ant:
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Best Local Similarity
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The invention relates to a novel isolated 17 mer nucleic acid sequence, given in the specification, a sequence containing at least 15 consecutive nucleotides from the 17 mer sequence, a sequence with, after optimal alignment, at least 80 % identity to the 17 mer sequence, a sequence that hybridizes to them under highly stringent conditions, or the complement of any of them, or the corresponding RNA. The novel isolated nucleic acids of the invention are useful as probes and primers for detecting, identifying, quantifying and/or amplifying a nucleic acid, e.g. as one component of a gene chip, in vitro as (anti)sense reagents, and for production of recombinant polypeptides. Any of the nucleic acids, vectors containing the nucleic acids, cells containing the vector or antibodies directed against the polypeptides are useful for preparation of pharmaceuticals for prevention and/or treatment of viral diseases that are characterised by development of tumours or cell
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Cytostatic; virucide; neuroprotective; nootropic; neuroleptic; gene chip; antisense; sense; tumour; cell degeneration; cancer; Alzheimer's disease;
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